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ABSTRACT

Investigates the use of Classroom Assessment Techniques (CATs) by adjunct faculty at three Florida community colleges. A qualitative methodology, with a phenomenological approach, helped to describe the meaning that the experience of using CATs had for adjunct professors. Interviews with eighteen participants were the primary means of data collection, supplemented by researcher field notes, demographic profile sheets and analysis of actual CATs. The data synthesized three levels of meaningful encounters, revealing the barriers that inhibited adjunct faculty use of CATs and how those obstacles were overcome, as well as facilitators that promoted use of CATs. A critical finding was that the CATs did not motivate adjunct faculty to move from "private" investigation of student learning to "public dialogue." The following conclusions were reached: (a) community college adjunct faculty use CATs to expand their own learning, often by designing probing questions in response to immediate classroom concerns; (b) deprivatizing adjunct faculty teaching is met with resistance; (c) CATs strengthen learning colleges as communication tools between instructors and individual students, but are not used to their fullest advantage to generate public dialogue on student learning. Institutional research forms, consent forms, and the interview instruments are appended. (Contains 127 references.) (RC)

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USING CLASSROOM ASSESSMENT TECHNIQUES: THE EXPERIENCES OF ADJUNCT FACULTY AT A VANGUARD LEARNING COLLEGE AND TWO NON-VANGUARD COMMUNITY COLLEGES

by

Heidi S. Tuby

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Doctor of Education

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by
Heidi S. Tuby

This dissertation was prepared under the direction of the candidate's dissertation advisor, Dr. Michele Acker-Hocevar, Department of Educational Leadership, and has been approved by the members of her supervisory committee. It was submitted to the faculty of the College of Education and was accepted in partial fulfillment of the requirements for the degree of Doctor of Education.

SUPERVISORY COMMITTEE:

Michele Acker-Hocevar
Dr. Michele Acker-Hocevar, Chair

Deborah L. Floyd
Dr. Deborah Floyd

Pat Maslin Ostrowski
Dr. Patricia Maslin-Ostrowski

John Pisapia
Dr. John Pisapia, Chair, Department of Educational Leadership

Dr. Gregory Albia, Dean, College of Education

Division of Research and Graduate Studies

5/7/03
Date

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ABSTRACT

Author:	Heidi S. Tuby
Title:	Using Classroom Assessment Techniques: The Experiences of Adjunct Faculty at a Vanguard Learning College and Two Non-Vanguard Community Colleges
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The purpose of this study was to investigate the use of Classroom Assessment Techniques (CATs) by adjunct faculty at 3 homogeneous Florida community colleges, 1 Vanguard and 2 non-Vanguard. A qualitative methodology, with a phenomenological approach, helped to describe the meaning that the experience of using CATs had for adjunct professors. Interviews with 18 participants, including adjunct faculty and faculty development administrators, were the primary means of data collection, supplemented by researcher field notes, demographic profile sheets, and analysis of actual CATs.

The data synthesized into 3 levels of meaningful encounters, revealing the barriers that inhibited adjunct faculty use of CATs and how those obstacles were overcome, as well as facilitators that promoted use of CATs. A critical finding was that CATs did not motivate adjunct faculty to move from "private" investigation of student learning to "public dialogue" on teaching and learning that can add to the scholarship of teaching.

The data showed that institutional commitment to CATs and a formal introduction to them as formative assessment, built upon a solid research base, were important steps toward encouraging their use. Also, "high touch" faculty development activities, which included CATs, effectively complemented those that were "high tech."

The findings of the study indicated that the Vanguard and non-Vanguard colleges shared similar ideas. The Vanguard Learning College, however, distinguished itself by the actions taken to become more learning-centered; adjunct faculty participants assumed leadership roles as educational researchers who pursued independent projects to develop instructional materials to improve student learning as compared to adjunct professors at the non-Vanguard colleges.

The following conclusions were reached: (a) Community college adjunct faculty use CATs to expand their own learning, often by designing probing questions in response to immediate classroom concerns. Therefore, the experience of using CATs is unique for each professor. (b) Deprivatizing adjunct faculty teaching is difficult, and sharing meets with resistance. At the Vanguard College, individual and communal learning are beginning to fuse. (c) CATs strengthen learning colleges as communication tools between instructors and individual students, but are not used to their fullest advantage to generate public dialogue on student learning.

To My Family

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CHAPTER ONE

INTRODUCTION

Community college adjunct faculty play a vital role in higher education. Comprising approximately 60% of the faculty at two-year colleges (National Center for Education Statistics, 2002), adjunct professors have extraordinary potential to contribute to what is known about student learning because they are knowledgeable in their disciplines and bring a fresh perspective to classroom environments. Researching specific adjunct faculty teaching experiences may be an effective step toward strengthening learning-centered institutions.

This study investigates community college adjunct faculty use of Classroom Assessment Techniques (CATs) and the meaning that the experience of using CATs in the classroom has for them. While CATs may generate innumerable possibilities for professors, they are simple instruments administered mid-course to collect data on student learning to generate immediate feedback for individual teacher reflection. This feedback can subsequently be used to make choices about instructional practices to meet student learning needs and course objectives. According to K. Patricia Cross (1998a), "Feedback is probably the single most important ingredient in improvement whether used by teachers to improve their teaching or students to improve their learning" (p. 7). Qualitative inquiry into the use of CATs may help to build an understanding of the way that adjunct faculty construct personal interpretations of learning encounters with students and how this affects interactions with other faculty members and the institutions where they work.

Concern for student learning and for documentation of student learning outcomes merits a search for effective ways for community college adjunct faculty to become learning facilitators, participate in public dialogue on teaching and learning, and add to the scholarship of teaching. Community college adjunct faculty become valued contributors who build upon the concept of the learning college through practical application of its principles.

Research Context

Community colleges are "open doors of opportunity" built on a foundation of accessibility, affordability, adaptability, and committed to quality teaching (Boggs, 2000; Cohen & Brawer, 2002; O'Banion & Associates, 1994). As locally based institutions that reflect the economic and social environments in which they are situated, community colleges have grown in both number and size during their extraordinary 100-year history. Enrollment figures reflect that success: Annual figures hover around 10.4 million students, with 5.4 million enrolled in credit programs. Forty-four percent of all undergraduates enrolled in United States institutions of higher education attend community colleges (American Association of Community Colleges, 2002).

Students attending community colleges come from diverse backgrounds and stretch the learning resources of these institutions in many directions. The students are typically older, have lower incomes, and are varied in race and ethnicity. More women than men now enroll in community colleges, and many part-time students juggle work and family responsibilities. Many choose to attend a community college to save money before transferring to a four-year institution to complete a bachelor's degree. At the same time, community colleges provide remedial work for those students who fell behind in high school and assist with English for non-native speakers (Adelman, 1999).

In response to the demands of serving a diverse student clientele, community colleges stress faculty responsibilities toward the students in their classes and student/teacher rapport (Boggs, 2000). Unlike institutions that have policies of "publish or perish," community colleges leave research and scholarship to personal choice, building instead a clear-cut and resounding commitment to student learning. "Community college teaching has emerged as a distinct profession" (Miller, 1997, p. 90).

Adjunct faculty play an important role in the profession of teaching at community colleges. The highest proportion of part-time faculty in higher education is at two-year institutions where the number has grown steadily since the early 1960s (Banachowski, 1996). There are several reasons for hiring adjunct faculty at community colleges: Part-time faculty save an institution money in salaries; they cost colleges "virtually nothing" in terms of sick leave, pensions, or health care insurance; they help colleges meet changing enrollment demands and stay within tight budgets while remaining steadfast to the policy of open access for students; and they are contracted on a per semester basis so institutional commitment to them is short term (Banachowski, 1996; Cohen & Brawer, 2002). At the same time, community colleges benefit by adjunct faculty bringing their specialized and valuable expertise drawn from real life working experiences into the classroom (Avakian, 1995). They may also view student learning from a new perspective—testing theories and ideas by comparing them with firsthand, careful observations in class and sharing those insights with other professors. Therefore, rather than referring to adjunct faculty as a "quick fix" for financial and enrollment fluctuations, part-time faculty need to be addressed for their "value added" to learning-centered colleges.

Learning College Concept

Rethinking the college experience around a new paradigm for undergraduate education has resulted in the learning college concept. In their landmark article, Barr and Tagg (1995) address the need for a shift from institutions that teach or instruct to ones that are "producing learning with every student by whatever means work best" (para. 3). Since then, the concept of the learning college has expanded into a broad vision of the institution itself as a learning-centered environment.

As the chief proponent of the learning college concept, Terry O'Banion (1997) defines the learning college as one that is designed to help students "make passionate connections to learning" (p. xiv). He also recognizes that institutions that place learning at the core of their mission need practical advice and direction on how to advance that ideal. Therefore, he crystallizes his definition into six principles of practice:

1. The learning college creates substantive change in individual learners.
2. The learning college engages learners as full partners in the learning process, with learners assuming primary responsibility for their own choices.
3. The learning college creates and offers as many options for learning as possible.

> 4. The learning college assists learners to form and participate in collaborative learning activities.
>
> 5. The learning college defines the roles of learning facilitators by the needs of the learners.
>
> 6. The learning college and its learning facilitators succeed only when improved and expanded learning can be documented for its learners. (O'Banion, 1997, p. 47).

Community colleges are proving to be an amenable home to the learning college concept; this is consistent with their history of curricular flexibility, responding to the demands of the economy or the changing profile of community college students by offering program options that accommodate many needs. These curricular options include channeling students into studies at the university level, preparing students for vocational-technical careers, bolstering poorly prepared high school graduates, offering continuing education for people of all ages, and providing cultural opportunities for the community at large to enjoy (Cohen & Brawer, 2002).

At community colleges that have begun the transformation, learning is central to their mission, and student learning is facilitated in an environment that provides a rich variety of approaches to learning. Since the purpose of a learning college is to place learning first in every policy, program, and practice, the challenge infiltrates all aspects of the institution and requires more than hasty, "add-on" modifications (PBS Adult Learning Service, 2002). The sweeping nature of the change is characterized by new roles and alternative learning structures. Leading the way, the League for Innovation in the

Community College, with funding provided by the Atlantic Philanthropic Service Company, initiated and directed The Learning Project (T. O'Banion, personal communication, March 23, 2003). This included the selection in January 2000 of 12 colleges, termed the "Vanguard Learning Colleges," to serve as examples or catalysts for the implementation of programs and best practices in learning-centered education, concentrating their efforts in the key areas of organizational culture, staff recruitment and development, technology, learning outcomes, and underprepared students (*The Learning College Project*, 2002).

The learning college concept relies on all participants in an institution becoming learners themselves. Accordingly, the role of community college adjunct professor also expands beyond the traditional notion of the scholarly individual, knowledgeable in a discipline, who must deliver content to students, to the more expanded role as a facilitator, who continually searches for ways to enhance learning. In this way, adjunct faculty assume important leadership positions by ensuring that the learning college model comes to life in the place where students and teachers connect most vividly—the classroom.

Classroom Assessment Techniques

As formative assessment tools used within the classroom context, CATs are a valuable teaching strategy to create and sustain meaningful learning. Closing the gap between what teachers believe they have taught and what their students have actually learned, CATs are considered essential and "fundamental" to the learning college concept (R. Lyons, personal communication, February 7, 2002).

In the late 1980s, K. Patricia Cross and Thomas Angelo devised a clearly outlined formative method of assessment for classroom use. They organized and systematized what had been an unstructured area of inquiry by writing two handbooks that provide actual CATs and examples of their use: *Classroom Assessment Techniques: A Handbook for Faculty* in 1988, and *Classroom Assessment Techniques: A Handbook for College Teachers (Second Edition)* in 1993. The latter added 20 new techniques to the original 30, grouping them according to three areas: knowledge and skills; attitudes, values, and self-awareness; and reactions to instruction. The original purpose of their work was to introduce the idea that the classroom can be a laboratory to observe students and study learning in an ongoing process (Angelo & Cross, 1993). It was hoped that classroom assessment, based on recurring formative feedback, would be the impetus for modifications in teaching.

As teacher-directed, context-specific activities to assess student learning, CATs continue to be promoted as formative assessment measures that are easy to adopt and adapt. In fact, professors are invited to tailor them to meet course objectives within changing classroom situations or with new groups of students. Professors can also move to another level of investigation through classroom research, "a probing, questioning, systematic pursuit of knowledge about learning and the impact of teaching on learning" (Cross, 1990, p. 136). When faculty engage in serious dialogue about how they are making adaptations, when investigations are designed and conducted with the goal of better understanding the relationship of teaching and learning, then classroom research matures as a subject of inquiry and its ties with faculty development are strengthened.

Community College Faculty Development

Faculty development is a key component of a learning college. As a comprehensive term that extends over a wide range of practices and activities, faculty development typically describes programs to promote faculty growth and help with the acquisition of knowledge, skills, sensitivities, and techniques related to teaching and learning (Gaff, 1975). Defined this way, faculty development focuses on improvements in teacher performance through either group activities, including orientation, workshops, lectures and conferences, or individual activities, including confidential consultation or videotaping. The direct goal of faculty development is to improve teaching by providing information, bolstering self-confidence, creating opportunities to practice new methods, and building a supportive institutional climate that values and rewards good teaching. "The point is that in faculty development, some external observer is providing information to the teacher on how to teach more skillfully" (Cross, 1990, p. 138).

Cross (1990) maintains that the relationship between faculty development and classroom research is strong since they both value effective teaching, but the central focus of classroom research is on students and how well they are learning. The teacher assumes the role of the observer, and classroom research focuses on student learning as a function of teaching. "The premise is that it makes no difference how perfectly a teacher is teaching if students are not responding" (p. 137). While faculty development is one way to increase student learning by improved teacher performance, understanding "what happens when teachers and students interact in the classroom is all important" (p. 138). In this way, CATs link teaching and learning in the most direct way: Teachers learn firsthand if what they believe to be effective teaching actually leads to student learning results. CATs are at the hub of the teaching and learning dynamic.

Since they provide direct feedback from students and support the process of instructional improvement through teacher reflection and action, CATs foster change. Yet, in faculty development programs at learning colleges, successful change is measured by learning outcomes that have been attained. With accrediting agencies assessing whether or not students have reached the educational objectives contained in mission statements and programs of study, faculty development becomes a means to an end, which is the documentation of learning through some measurement of student achievement. According to Maki (2002), assessment of learning should not be periodic or performed only when an accreditation visit is scheduled, as an act of compliance. Instead, it should be an ongoing response to internal motivators, as an act of institutional curiosity. "Institutional curiosity seeks answers to questions about which students learn, what they learn, how well they learn, when they learn, and explores how pedagogies and educational experiences develop and foster student learning" (para. 2). Maki (2002) claims that accrediting agencies are increasingly interested in what colleges are discovering about learning, eliminating some of the tension between external and internal motivators. This further strengthens the alignment of faculty development programs with the learning college concept.

Despite the benefits for teaching and learning, faculty development still remains one of the least prominent items in most American institutions of higher education (Roueche, Roueche, & Milliron, 1995). A recently conducted national survey (Murray, 1999) of more than 100 community colleges reports that there is a "glaring" lack of commitment on the part of leadership for faculty development, resulting in a disorganized, patchwork approach. Also, most community college faculty development programs concentrate on full-time faculty (Alfano, 1994). Although they are not intentionally designed to overlook adjunct faculty, programs do not draw substantial adjunct faculty participation since part-time faculty are paid only for the hours they teach. Instead, a common approach is to expose adjunct faculty to a variety of topics during a brief orientation session, avoiding the responsibility of providing a comprehensive program that can prepare part-time faculty for "ownership" of the purpose, mission, and values of the institutions where they teach (Greive, 1999).

Recent recommendations call for community colleges programs that are goal-directed, structured, offered to the widest possible audience of both full-time and adjunct faculty, and connected to a range of extrinsic and intrinsic rewards; faculty must know that good teaching is valued by administrators (Murray, 1999). Additionally, faculty development programs should be faculty-owned and encourage support among colleagues so that continuous teaching improvement is a shared concern (O'Banion et al., 1994). Activities at community colleges should inspire professors to improve instructional materials and methods of delivery and to establish links with their professional colleagues. It is also important to rekindle the spark of creativity and enthusiasm that is so important in teaching (Alfano, 1994).

Ties among faculty development, classroom research, and CATs are strengthened when individual insight and understanding are most highly valued; in such instances, programs are freed from the search for a "one size fits all" teaching agenda or for universally appropriate teaching methods. A better understanding of student learning and of ways to increase learning outcomes begins in the classroom and moves outward. By valuing professors as observers, faculty development programs inspire faculty to actively learn rather than to passively accept ideas imposed upon them.

Statement of the Problem

The future is going to test the flexibility of community colleges if projections of increased student enrollment are correct. In their planning, community colleges must also take into account the upcoming retirement of many full-time faculty and how this will impact on the hiring of adjunct faculty and the designing of faculty development programs that attempt to build an inclusive learning college committed to achieving and documenting student learning outcomes. The success of community colleges may depend upon their ability to strengthen the academic environment while hiring adjunct professors. An investigation of community college adjunct faculty use of CATs may suggest several ways to overcome barriers, reinforce facilitators, and recognize the potential learning and leadership roles that adjunct faculty can play within the learning college. Given the increase in the number of adjunct professors employed at community colleges, it seems timely to regard the work of adjunct faculty as directly contributing to the goals of a learning college.

Barriers to implementation of CATS may be a product of the terms of adjunct faculty employment, the lack of preparedness to teach or background in pedagogical issues, and the reluctance of professors to expand their methods of course delivery beyond what they were exposed to as students themselves. An inadequate or poorly designed faculty development program may prove to be another obstacle. In contrast, facilitators to implementation of CATs may be faculty development programs that have been revised to meet a learning-centered paradigm. While a program that is well-integrated into the fabric of an institution may support successful use of CATs, self-motivation may be a stronger determinant of an individual's ongoing reexamination of teaching practices, followed by participation in a public exchange of ideas.

An investigation of community college adjunct faculty use of Classroom Assessment Techniques may demonstrate the expansion of the learning college concept from theory to practice. Although the CAT experience happens in the privacy of one's classroom, through this investigation more will be learned about CATs, the role played by faculty development, and possibilities for adjunct faculty contribution to the learning college.

Conceptual Framework

This study investigates adjunct faculty use of CATs to gain insight into the acceptance or rejection of a formative assessment method that encourages improved understanding of student learning. Among the central concepts for this study are formative assessment and classroom research.

Formative Assessment

Education is the process that changes learners (Bloom, Hastings, & Madaus, 1971). Likewise, assessment is the systematic collection of evidence to determine whether certain changes have taken place or are in the process of taking place, and to what degree. Assessment is always linked to learning—from students, to faculty and their practices, to researchers, and to all expanding contexts (Gardiner, Anderson, &

Cambridge, 1997). Brookhart (1999) claims that assessment impacts on both students and teachers as it increases awareness of the match between what is being learned and what is being taught.

Scriven (1967) is the first to develop the concept of "formative" as distinct from “summative” assessment. Formative evaluation attempts to improve a course while it is still in progress; it is a type of feedback or "field-testing of the work while it is being developed" (p. 43). Bloom et al. (1971) look at formative evaluation as a "tryout process since it can be used to locate specific difficulties that students are having with a particular portion of a curriculum" (p. 135). According to Brookhart (1999), formative assessment is separate from student assessment or the exams and papers that impact on the official course grade. The timing of formative evaluation, during instruction rather than at the close of a unit or at the end of a semester, allows for a quick alteration in the methods of instruction (Bloom et al., 1971).

Although Scriven (1967) acknowledges that teacher response to any type of feedback is often anxiety due to fear that one's worth or value is being quantified or judged, he cautions that failure to look objectively at teaching performance can lead to incompetence. "A little toughening of the moral fiber may be required if we are not to shirk the social responsibilities of the educational branch of our culture" (p. 42). Scriven's goal is to develop a combined methodology of formative and summative evaluation that works to help develop good curriculum and effective teaching practices.

Formative assessment has remained consistent in concept, but formative assessment techniques have multiplied and undergone many changes. Formative techniques may include ungraded or experimental quizzes or tests to provide teachers with information on what to alter in instruction or what areas to review if students are having difficulty. In recent years, ungraded, anonymous questionnaires distributed and collected before the close of a class session have provided a simple-to-use formative assessment instrument.

Cross (1998a) acknowledges that assessment can have many ramifications, but it originates in one-to-one interactions, "Although assessment has many audiences, including legislators, accreditors, and the general public, in the final analysis, it is teachers and students, working together, who are ultimately responsible for the quality of learning" (p. 6). As a method of formative assessment, CATs help professors find out what students are learning and to what extent they are learning it. CATs let professors assess learning in a wide variety of areas, including course content, background knowledge, study skills, barriers to learning, and student attitudes. As flexible instruments, CATs can be designed to fit the needs of the professor. Consistent with the non-judgmental, non-punitive nature of formative assessment, CATs provide feedback to teachers and students and are not linked in any way to evaluations of students or grades.

Classroom Research

Cross (1998a) asserts that the shift from assessment for accountability to assessment for improvement is well underway, resulting in a new definition of the term "classroom research," which is the study of learning with the desire to improve student learning. The goal of classroom research is to provide feedback (Cross, 1990). That, in time, will enable the gap between what is taught and what is learned to narrow. "This approach is leaner-centered, teacher-directed, mutually beneficial, formative, context-specific, ongoing, and firmly rooted in good practice" (Angelo & Cross, 1993, p. 4).

In their early writings, Angelo and Cross used the terms classroom assessment and classroom research interchangeably, but in the late 1990s a conceptual distinction grew in the use of the two terms (Paulsen, 2001). Classroom assessment is now thought of as the underpinning of classroom research. It looks at a particular situation objectively and investigates the "what" questions in teaching and learning (Cross, 1995). In essence, the classroom becomes a laboratory where the link between teaching and learning is the most exposed. "With intrinsically designed goals, each classroom is its own object of study; each instructor a researcher" (Cohen & Brawer, 2002, p. 370).

Classroom research is an attempt to extend what was explored in the classroom setting to a higher level of insight into student learning. It is a broad term that encompasses the "how" and "why" questions surrounding student learning (Cross & Steadman, 1996). However, classroom research always begins with an investigation under realistic conditions. "It is not an add-on activity. It is embedded in the regular ongoing work of the class" (Cross, 1998a, p. 9). Classroom research has the added benefit of encouraging interaction between professors and their students; the latter are not thought of as subjects of research, but are treated as collaborators. Classroom research begins at a first level, with discussions with students about learning, and then moves to departmental and interdepartmental sharing of ideas (Cross, 1998a). Since classroom research is always linked to actual classrooms, it relies upon assessment techniques to provide the specific information upon which to build.

This type of research is dependent on professors who know their subject matter, have a desire to teach it to students, interact continually with students, and want to know more about the nature of learning itself so that teaching can be improved. According to

Cross (1998a), classroom research bears little resemblance to traditional research. The latter takes place outside of the classroom, often requires special equipment and library facilities, and typically leads to published findings and recommendations. In contrast, classroom research seeks direct feedback on what is taking place inside the classroom, does not require special equipment or library work, and is not specifically directed toward publication. The immediacy of the feedback can lead to swift changes in teaching practices as the process comes full circle quickly.

Rationale for the Study

Community colleges are committed to student learning, yet most adjunct faculty at these institutions have limited exposure to information about teaching and learning and need some experience to acquaint themselves with students' needs and ways of teaching that will help them meet those needs (Miller, 1997). Integrating community college adjunct faculty into a learning college is a challenge.

The barriers and facilitators of using CATs in the community college setting warrant description. As institutions claiming dedication to learning outcomes, community colleges can benefit by adjunct faculty use of CATs for both "private" investigation of student learning as well as "public" dialogue on teaching and learning. A study of adjunct faculty use of CATs can impact on faculty development programs, prompting them to place greater emphasis on these easy-to-use, formative assessment measures. With a large number of community college full-time faculty now reaching the age of retirement, teaching by adjunct professors may no longer be thought of as "supplemental," but will be a key pillar of support for these institutions. Their status as "invisible" must change to "valued" as their impact on college instruction can no longer be overlooked (Gappa & Leslie, 1993). This study looks at the potential of one strategy, the use of CATs, to motivate adjunct faculty to investigate student learning in their classrooms, join the public dialogue on teaching and learning, and add to the scholarship of teaching; it looks at one way of turning the idea of a learning college into a reality.

Purpose and Significance

The purpose of this study is to gain insight into community college adjunct faculty use of Classroom Assessment Techniques (CATs). Qualitative inquiry may reveal what it means to adjunct professors to use CATs in their classrooms; it may expose the barriers, which are overcome, and the facilitators, which are helpful, in achieving successful classroom practice. The purpose is also to explore the extent to which the use of CATs generates an interest in public dialogue on teaching and learning. This information may prompt faculty development programs to expand activities and conversations related to CATs.

This study has significance not only for individual adjunct professors and community college leaders, but also for the profession of teaching. Cross (1995) believes that involvement in classroom assessment and classroom research prepares faculty for "a leadership role in the restructuring of teaching and learning" (p. 15). According to Cross, traditional educational researchers cannot do the restructuring because they lack continual access to the natural setting of real classrooms. When adjunct faculty are actively engaged in researching their teaching, they contribute to the restructuring of teaching and learning and assume an important leadership role.

Rarely is the effectiveness of a method of improving adjunct faculty instruction or inclusion of adjunct professors in the learning college the subject of educational research. This study is an attempt to learn more about community college adjunct faculty use of CATs and to contribute to the scholarship of teaching by adding the voices of a missing group of professionals.

Methodology

A qualitative methodology, incorporating a phenomenological approach, is used. The study investigates the subjective experiences of adjunct faculty as they use CATs and the meaning that the phenomenon, the lived experience of using of CATs, has for them. The participation of faculty development administrators and adjunct faculty from 3 of Florida's 28 community colleges is required. Interviewing is the principal data collection method, supplemented by researcher field notes, demographic profile sheets, and document analysis of actual CATs.

Findings from the data are the result of inductive analysis and synthesis, as pattern codes emerge in an interpretation of recurring themes. These themes meet two criteria: internal homogeneity (the codes dovetail or hold together) and external heterogeneity (the differences between the themes are bold and clear) (Patton, 2002). Throughout the research, a phenomenological approach helps identify and describe the subjective experiences of the participants.

Research Questions

- What are the barriers that inhibit community college adjunct faculty use of CATs and how are they overcome?
- What are the facilitators that encourage community college adjunct faculty use of CATs?
- What evidence is there, if any, that CATs motivate community college adjunct faculty to move from a "private" investigation of student learning to a "public" dialogue on teaching and learning and add to the scholarship of teaching?
- What effect, if any, do faculty development programs have on community college adjunct faculty use of CATs?
- What are the differences, if any, between the effects of Vanguard and non-Vanguard colleges on community college adjunct faculty use of CATs?

Assumptions and Biases

The study assumes that a better understanding of community college adjunct faculty use of CATs can result from qualitative inquiry at a limited number of sites and with a limited number of participants. Although generalizability is narrowed to the participants only, the study has far reaching potential to contribute to an understanding of similar experiences by individuals at other institutions. Another assumption of this study is the willingness of adjunct faculty to openly approach the sensitive nature of the topic itself. Despite assurances of confidentiality, adjunct professors participating in this study may feel reluctant to discuss their colleges; they may also refuse to share the results of CATs as well as student responses to their teaching, preferring privacy.

It is also an accepted and recognized possibility that the researcher might have a certain bias in this study since she is an adjunct professor and uses CATs. As a quasi-outsider, the researcher might lose objectivity and let personal feelings slant the research. To limit researcher bias, the researcher has kept a journal of reflections and observations of her behavior and attitudes during the interviews.

Definitions

Adjunct Faculty—non-tenure track faculty serving in a temporary capacity and teaching on a course-by-course basis. Adjunct faculty include faculty members who teach academic, degree-credit courses and remedial, developmental, or ESL courses. Appointees who teach non-credit classes exclusively do not come under the umbrella of adjunct faculty (National Postsecondary Education Cooperative Definition Bank, n.d.). Contract duration for adjunct faculty is usually one semester. Wages are based on a flat per course fee or calculated by classroom contact hours. The number of courses or credits taught by adjunct professors varies by institution, but the job description for adjunct faculty is usually, specifically, to teach students. Outside responsibilities, including scheduling office hours or attending faculty development days, also vary by institution. Adjunct faculty have due process protection only for the duration of their employment. For the purpose of this study, the terms "adjunct faculty" and "part-time faculty" will be used interchangeably. This is not universally true as the meanings attached to the two phrases are distinct at some colleges (Roueche et al., 1995). In contrast with adjunct faculty, “regular” part-time faculty are not paid on a course-by-course basis (National Postsecondary Education Cooperative Definition Bank, n.d.). The educational research literature often refers to adjunct faculty as “instructors.” On college campuses today, however, adjunct faculty are increasingly addressed as “professors.” For example, at Palm Beach Community College, full-time faculty recently requested that they be addressed as professors, not instructors. The administration of the college agreed to the change, and at the same time, “extended that title to adjuncts as well” (S. Sass, personal communication, March 26, 2003). Therefore, in recognition of their talents and “value added,” this study refers to adjunct faculty as professors.

Faculty Development Administrator—the administrator employee who is responsible for faculty development activities, which may include orientation for new faculty, orientation at the start of a new semester, development days, workshops, special presentations, and speakers. At some community colleges, this can be a part-time position. The individual who assumes this duty may have other staff development activities to organize or is a full-time professor who undertakes this role in exchange for reduced teaching responsibilities.

Assessment—gathering and interpreting information about the achievement of learning goals. Although assessment's general purpose is improving education, there are two distinct objectives: assessment for accountability and assessment for improvement (Brookhart, 1999). According to Cross (1990), assessment for accountability is often public in nature and is a summative or "stop the motion" measurement of what has been achieved. In contrast, assessment for improvement is often private in nature and is a formative or "continuous motion" look at teaching and learning while they are in process. In her overview of the history of assessment, Wright (2000) discovers an uneven, back and forth struggle between accountability and improvement. According to

Wiggins (1998), educative assessment should teach and not just measure; it should provide useful feedback to students, teachers, administrators, and policymakers. For Angelo (1999), assessment is not a superficial monitoring device added on to academic programs; instead it requires self-examination, reflection, and continuous improvement. Assessment transforms "teaching factories" into learning colleges. Huba and Freed (2000) believe that assessment plays a key, proactive role in the current movement to become learner-centered institutions. "In other words, through assessment, we not only monitor learning, but we also promote learning" (p. 8). As a result, assessment includes gathering and using information to improve subsequent learning. Assessment is not an end product; it is part of a continuum.

Classroom Assessment—feedback for professors on what students in their classroom have learned and how well they have learned it. The individual student usually remains anonymous. This is the first step and "the predominant element" (Angelo & Cross, 1993, p. 382) in classroom research. Classroom assessment begins with stating goals, devising ways to meet them, and then measuring the degree of success; this creates a feedback loop. In the last fifteen years, the number of classroom assessment tools has expanded.

Summative Assessment—feedback on learning at the conclusion of a course; feedback on individual student or group achievement through tests, quizzes, papers, and projects that figure into grade calculation. Mostly quantitative in nature, summative assessment impacts on individual students, programs, institutional accountability, faculty rehiring, and tenure.

Classroom Assessment Techniques (CATs)—simple, easy-to-use tools for collecting data on student learning in order for individual teachers to find out "how much, how well, and even how students are learning what they are trying to teach" (Angelo & Cross, 1993). CATs are activities and questionnaires for students to respond to for a few minutes during class; generally, students do not identify themselves on their papers. CATs are a method of formative assessment used to improve learning, not assign grades. Examples of CATs are clearly explained in *Classroom Assessment Techniques: A Handbook for Faculty*, published in 1988, and *Classroom Assessment Techniques: A Handbook for College Teachers (Second Edition)*, published in 1993. The authors, K. Patricia Cross and Thomas Angelo, explain that the CATs are drawn from three basic sources: their own teaching repertoires, literature on teaching methods in secondary and postsecondary education, and classroom research and assessment programs in colleges all over the country. One of the most popular CATs is the One-Minute Paper; it asks students to answer the following two questions: What was the most important thing you learned today? What questions remain uppermost in your mind as we conclude this session? (Cross, 1990). This CAT provides a significant amount of feedback from a very small investment of time (Huba & Freed, 2000).

Course Objectives (learning goals, learning outcomes)—the goals set by the professor; what he/she intends that students learn. Learning outcomes, however, often refer to the goals of a particular program for students when they are "outside" the institution and applying new skills. "Student learning outcomes state what students should know and be able to do as a result of their course work and educational experiences at an institution or in a program of study. These outcomes encompass areas of knowledge and understanding, abilities, habits of mind, modes of inquiry, dispositions or values" (Maki, 2002, para. 1).

Scholarship of Teaching—inquiring about teaching in a scholarly way so that student learning is continually improved. The goal of the scholarship of teaching is to improve one's own classroom and add to a public core of ideas. It begins with "evidence gathering" or classroom assessment, but it invites peer collaboration and group reflection; it becomes "public, open to critique and evaluation, and in a form that others can build on" (Hutchings & Shulman, 1999, p. 12).

Learning College—an institution of higher education that makes learning at all levels of the organization the highest priority. A learning college articulates that students' learning is the main concern, and the learning must be documented. O'Banion (1997) defines the learning college as one that is designed to help students "make passionate connections to learning" (p. xiv) and is based on several key ways to provide, as well as document, opportunities for learning. While the student is responsible for learning, everyone at the college plays a role in achieving this goal. Transformation of an institution into a learning college is not an additive measure or a "quick fix." It requires that all practices and policies be learning-centered. The emphasis is on faculty and staff learning as well. A learning-centered college is one that has incorporated new roles, structures, assessments, and culture that reinforce a commitment to learning.

Learning Paradigm—the role of a college is to produce learning, not just provide instruction. Barr and Tagg (1995) address the need for a shift from institutions that teach to ones that "produce learning with every student by whatever means work best" (para. 3). Therefore, teaching is a means to reach the goal of student learning. A college that exists to produce learning creates powerful learning environments, encourages student discovery and construction of knowledge, and works toward successful achievement by students from diverse backgrounds or with a variety of abilities.

Vanguard College—The Learning College Project of the League for Innovation in the Community College envisions the learning college as a place that "provides educational experiences for learners anyway, anyplace, anytime" (*The Learning College Project*, 2002, para. 1). In January 2000, an international group of scholars selected 12 institutions to serve as "incubators and catalysts" for the Learning College Project. These designated "Vanguard Learning Colleges" are considered premier examples of institutions that are strengthening policies with a focus on the Learning College Project Objectives. These objectives include the following: (a) organizational culture that supports learning as the major priority; (b) staff recruitment and development that ensure new staff and faculty are learning-centered and professional development programs that prepare staff and faculty to become more effective facilitators of learning; (c) technology that is used primarily to improve and expand student learning; (d) learning outcomes that are based on core competencies chosen by the Vanguard College, including assessment strategies to gauge the acquisition of learning outcomes and measurements to document the achievement of those outcomes; and (e) learning-centered programs that have strategies to ensure the success of underprepared students. Funding is provided to the 12 Vanguard Learning Colleges for three years.

Short Outline of the Dissertation

This dissertation is presented in eight chapters. Chapter One includes the research context, statement of the problem, conceptual framework, rationale for the study, purpose and significance, methodology, research questions, assumptions and biases, and definitions. Chapter Two follows with a review of the related literature about adjunct faculty at community colleges, Classroom Assessment Techniques (CATs), the reform movement and assessment for improvement, scholarship of teaching, faculty development programs at community colleges, and the learning college concept and contextual research. Chapter Three provides the details about the methodology. Chapters Four, Five, Six and Seven present the findings. Chapter Eight summarizes the study, arrives at conclusions, discusses the findings, and makes recommendations for practice and further study.

CHAPTER TWO

LITERATURE REVIEW

The review of the literature reveals several categories of related writings and studies, including (a) adjunct faculty at community colleges; (b) Classroom Assessment Techniques (CATs); (c) the reform movement and assessment for improvement; (d) scholarship of teaching; (e) faculty development programs at community colleges; and (f) the learning college concept and contextual research. The review begins with an examination of the role of adjunct faculty at community colleges and the potential of working conditions to interfere with motivation to improve teaching effectiveness. The nature of Classroom Assessment Techniques (CATs), which are convenient, easy-to-use instruments for formative assessments in the classroom, are described in detail. Past research indicates the effectiveness of CATs as a feedback instrument, the value of which may facilitate use among adjunct professors. The reform movement and growing interest in assessment for improvement set the stage for an appreciation of teaching as a scholarly activity and the responsibility of college professors to continually appraise and improve their own teaching. Since the scholarship of teaching extends what is learned in the classroom to a wider group of participants, faculty development programs at community colleges are researched with respect to adjunct faculty participation in them. Finally, the learning college concept and contextual research of student learning are reviewed. These six areas of the literature highlight possible clashes between life as an adjunct professor and the ongoing processes required to strengthen a learning-centered college, beginning with classroom assessment and extending to the scholarship of teaching.

Adjunct Faculty at Community Colleges

Adjunct professors comprise approximately 60% of the faculty at American community colleges (National Center for Education Statistics, 2002). In average-size community colleges, one out of three courses is taught by a part-time professor; at larger colleges, about two out of five courses are taught by part-time professors (Roueche et al., 1995). Grubb and Associates (1999) calculate that 52% of the total faculty are adjunct instructors who teach 37% of the courses.

Community colleges have a long history of employing adjunct faculty. Early 20th century community colleges hired high school teachers or university professors seeking supplemental income as part-time instructors (Cohen & Brawer, 2002). However, as community colleges gained in enrollment, they found they could support full-time instructors, who numbered two thirds of the faculty by the late 1960s. Adjunct faculty were categorized as either "volunteers" or "captives"; the first term referring to retirees or instructors who were not dependent on income from teaching, the second referring to instructors with no other source of funds, many of whom hoped for a full-time teaching assignment. By the mid 1980s, adjunct faculty comprised 60% of the faculty, but that number declined again, moving closer to 50% in the early 1990s. Historically, fluctuations were largely due to new curriculum, the demands of state and accrediting associations, and adjunct faculty availability. In recent years, financial concerns, resulting from shifts in student enrollment and inconsistencies in federal and state revenue, have made the hiring of adjunct faculty one way to cope with quick changes (Cohen & Brawer, 2002).

The greatest benefit of hiring adjunct professors is the contribution of their specialized expertise and "real life" job experiences to classroom learning (Avakian, 1995; Cohen & Brawer, 2002; Lyons, 1999). But the practical reasons for hiring adjunct faculty today are low salaries compared to full-time faculty and short-term institutional commitment (Frakt & Castagnera, 2000). Increasingly, low-cost labor to balance the budget has become the key to adjunct faculty employment. Without any fringe benefits or health insurance, adjunct faculty cost less to employ than full-time professors and they can be hired, dismissed, and rehired to meet changing needs. Cohen and Brawer (2002) caution that community colleges should not use adjunct faculty as "a way of avoiding employing a full-timer" (p. 89); they comment also that "part-time instructors are to the community colleges as migrant workers are to the farms" (p. 86). Avakian (1995) describes adjunct faculty as a "quick fix."

Research indicates that many adjunct professors would apply for full-time positions if they became available (Cohen & Brawer, 2002). On occasion, part-time faculty have petitioned for per-course pay, plus health and retirement benefits, that would equal that of full-timers, "but these efforts have borne scant fruit" (p. 89). Adjunct faculty often teach part-time by default (Grubb et al., 1999; Outcalt, 2000). But in terms of their hours, many are already teaching a full course schedule, often at more than one institution, earning them the name of "freeway fliers" (Gappa & Leslie, 1993, p. 48).

According to Grubb et al. (1999), "Such multiple commitments constrain their time and limit the energy they have for teaching" (p. 332).

Reduction in the employment of adjunct faculty at community colleges does not appear likely. One area of investigation is the degree to which particular institutions plan their use of adjunct faculty and to which types of pressure they respond. Gappa and Leslie (1993) find that "community colleges, overwhelmed by growing enrollments and diminishing budgets, and remaining faithful to a tradition of open access, are forced into increasing use of part-time faculty beyond any reasonable limit or plan they might have had" (p. 128). Swift accommodation to external demands is a typical response of community colleges; they are coping with change rather than anticipating and planning for change.

Community college adjunct faculty are generally required to have the same academic credentials as full-time faculty. Since the sources of community college professors are currently the workplace, graduate schools, or other colleges, attempts are being made to improve preparation of community college faculty before they arrive on campus (Cohen & Brawer, 2002). The results are inadequate. Specialized graduate school programs in particular draw only a small audience (Miller, 1997). A 1994 study by Keim identifies 58 programs with a community college emphasis; these programs produce only 200 graduates per year (as cited in Miller, 1997). Consequently, professors begin their classroom responsibilities without any professional training. Adjunct faculty familiarity with the history and philosophy of community colleges is particularly limited. According to Lyons (1999), most community college adjunct professors are employed full-time outside academia and are drawn to part-time teaching by the opportunity to share their expertise and passion for their fields of interest, yet they lack teacher training and are not prepared to meet the needs of students today when they begin their new role as professors.

Beginning in the 1970s, studies have looked at the use and demographics of part-time faculty. Howard Tuckman's 1978 survey of approximately 4,000 instructors identifies seven subcategories of adjunct faculty based on their reasons for choosing part-time employment (as cited in Gappa & Leslie, 1993). Fifteen years later, Gappa and Leslie (1993) reconfigure and reduce that number, yielding four categories that describe adjunct faculty in terms of their work experiences and motivation to teach part-time. Their sweeping study, conducted at 18 institutions, including 6 community colleges, consists of interviews with 240 part-time instructors, 146 department chairs, 58 administrators, and 23 faculty leaders (467 individuals in total). The research reveals that adjunct faculty can be grouped as either "career enders" (retiring from successful careers in other fields or former full-time teaching positions); "specialists, experts, or professionals" (enjoying teaching as a way of sharing their expertise while employed full-time elsewhere); "aspiring academics" (hoping to move into full-time teaching positions while making contacts as adjunct instructors); and freelancers (constructing careers around several part-time jobs or supplementing responsibilities at home). In the 1980s, studies focus on the impact of adjunct faculty on institutional policy, research, hiring, and wages. More extensive surveying begins in the late 1980s, notably by the National Center for Education Statistics. Typically, these surveys generate reports that are concerned about the excessive level of part-time faculty use. Policy statements, including one by the Study Group on the Conditions of Excellence in American Higher Education and another by the National Education Association (NEA), refer negatively to part-time faculty and suggest that the practice of hiring them might be economically advantageous but educationally unsound (as cited in Gappa & Leslie, 1993).

In general, research on adjunct faculty is scarce. "The agencies and organizations which gather information on college faculty have all but ignored the part-timers. Available data about them have been collected sporadically; information is shallow and spotty. Even rarer have been studies of how part-time faculty go about the business of planning courses, of teaching, or of engaging in classroom research" (Schwarze, 1996, p. 32). Most research on community college teaching centers on full-time faculty; adjunct faculty are addressed peripherally. Gibson-Harman, Rodriguez, and Grant Haworth (2002) write that scholarship on the issue of part-time faculty materialized in the late 1980s, but "the topic has waned considerably in popularity among community college scholars since then" (p. 80.). Describing a national survey of more than 5,000 community college faculty members, conducted by the Carnegie Foundation for the Advancement of Teaching and the National Center for Postsecondary Improvement (NCPI), Huber (1997) states that part-time faculty account for only 21% of the respondents from community colleges, despite the fact that they comprise more than 60% of the faculty. She writes, "Our survey aimed to include this fastest-growing group of academics, but they remain nonetheless seriously underrepresented . . . ." (p. 13). Seidman's study (1985) investigates community college faculty understanding of their work through the method of in-depth phenomenological interviewing; the purpose is to look at strongly committed community college faculty through their own reconstruction and reflection, to better understand the "meaning" they create based on their own experiences. The goal is to learn about the ways in which instructors shape their own lives. Seidman's methodology of in-depth interviewing (including 76 community college faculty in several states over a three-year period) leads to findings that are, as much as possible, in the exact words of the faculty. The material from the interviews is presented two ways: examined first as individual profiles and then grouped around specific themes, such as improved teaching. Seidman, on occasion, interviews part-time faculty; their frustrations largely mirror what full-time faculty already express. Adjunct faculty are not approached as a separate group with special concerns. The unique perspective of adjunct faculty on a variety of issues, particularly teaching and learning, is not addressed.

By the 1990s, concern for the quality of adjunct faculty instruction prompts several studies that address this issue. The literature does not substantiate the perception that adjunct professors do not teach as well as full-time faculty (Banachowski, 1996; Johnson, 2000; Lyons, 1999; Roueche et al., 1995; Rose, 1992; Schwarze, 1996). According to a survey by Rifkin of 1500 faculty members at 127 community colleges, part-time faculty have high expectations and are very involved with students, despite less involvement in their institutions (as cited in Outcalt, 2000).

Two notable studies from the 1990s confirm that adjunct faculty teaching is on par with that of full-time faculty. The first by Rose (1992), which explores the use of adjunct faculty in the community college using grounded theory analysis, finds that the misperceptions about adjunct faculty performance continue to persist. His data consist of intensive formal and informal interviews with full-time and part-time faculty, students, and administrators at Passaic County Community College. As his data collection progresses, the researcher finds a disparity between full-time faculty perceptions of adjunct faculty and reality. Full-time professors believe that adjunct professors are inaccessible to their students and provide an inferior classroom experience. Rose finds, to the contrary, that adjunct faculty serve students well in many ways. He also reveals that full-time faculty participants in the study are so committed to their viewpoint that they are reluctant to accept his findings. Rose concludes that misperceptions are largely due to lack of interaction between the two groups of faculty. Recommendations at the close of this study include more interaction between full-time and part-time faculty to foster constructive relationships and increase collegiality.

The second by Schwarze (1996) compares the teaching goals of full-time and part-time faculty in order to confirm or refute the belief that the academic quality of an undergraduate program is weakened by the use of adjunct faculty. Schwarze conducts her study at Webster University with the underlying assumption that identifying course goals is essential to an evaluation of teaching effectiveness in the classroom; she uses the Teaching Goals Inventory developed by Angelo and Cross as the basis for her instrument. The findings confirm that full or part-time status is not a significant factor in selecting course goals; all faculty use a variety of means to assess student learning, including CATs. This study is a comparison of the teaching abilities of full-time versus part-time faculty. CATs are not the focus of her investigation.

The landmark national study by Gappa and Leslie (1993) not only groups adjunct faculty into categories, as mentioned above, but looks at adjunct faculty working conditions and the existence, if any, of institutional policies that shape practice. They find that little is being done nationally to improve the quality of education in institutions with large numbers of part-time instructors. "So much has been said about how and why using part-time faculty is undesirable and about the resulting erosion of quality that an almost self-fulfilling prophecy has infected the whole climate in which academic staffing decisions are made" (p. 6). Their study's purpose is to "shed light on the academy's invisible underclass and the exploitive conditions under which its members work" (p. 284). Their results not only reveal the nature of adjunct faculty employment but also suggest measures that colleges can take to align the use of adjunct faculty with institutional goals. The authors readily acknowledge that their mission is to learn what can be done to improve part-time instructors' morale and commitment to their institutions. They hope that new practices move the "invisible" adjunct faculty into the spotlight as "valuable" faculty. Although the authors make several suggestions for faculty development programs for adjunct faculty and recognize that adjunct instructors need assistance with pedagogy, the emphasis is on integrating adjunct faculty into the basic structure of the organization. The central concern of the study is using the resources of part-time faculty wisely, without exploitation, and eliminating through policy changes the negative effects of a bifurcated full-time/part-time faculty work culture.

A growing appreciation for the valuable contribution of adjunct faculty is well timed. The retirement of many full-time faculty at community colleges impacts on hiring practices in the future. If the percentage of adjunct faculty remains at 60% or increases, future planning must focus on ways to incorporate adjunct professors into the learning college. Cohen, Brawer, and Associates (1994) insist that institutional planning means developing a system that is arranged in such a way that all involved feel part of the process. The shared ownership of goals and policies motivates everyone on the staff. "The system must safeguard against any party feeling slighted or overlooked. The days of hierarchical power struggle are gone. This is the age of cooperation, of seeing power as the ability to empower others" (p. 476). Although Cohen et al. argue against hierarchical power struggles, there is little evidence within organizations to suggest that the age of cooperation is here.

Recent literature concentrates on adjunct professors' working conditions and reflects resentment over low pay, lack of benefits, and treatment as temporary help (Fulton, 2000; Grubb et al., 1999; Roueche et al., 1995). References to adjunct faculty are often unflattering; they include "gypsy faculty," "the academic underclass," "components of a tinker toy system of staffing," "freeway fliers," and “strangers” (Roueche et al., 1995). Dubson (2001) mentions the tension among many adjunct professors; this conflicts with the desire to build a harmonious community committed to institutional mission. One potential way to do this is to use CATs as a basis for dialogue.

Classroom Assessment Techniques (CATs)

Classroom assessment is a systematic approach to formative evaluation, and Classroom Assessment Techniques (CATs) are simple instruments used to collect data on student learning with the purpose of improving it (Angelo & Cross, 1993). Each CAT consists of a specific questionnaire or activity that can generate immediate feedback for the teacher. K. Patricia Cross and Thomas Angelo published two handbooks that provide actual CATs and examples of their use, including *Classroom Assessment Techniques: A Handbook for Faculty* in 1988, and *Classroom Assessment Techniques: A Handbook for College Teachers (Second Edition)* in 1993. The latter added 20 new techniques to the original 30, grouping them according to three areas: knowledge and skills; attitudes, values, and self-awareness; and reactions to instruction. For ease of use, all 50 techniques are reshuffled in three indexes (alphabetical, by discipline, and by major goal) to help teachers find and use an appropriate technique in a given situation. Information on each CAT includes ease of use, basic description, purpose, teaching goals addressed, suggestions for use, actual examples, step-by-step procedures for administration, advice on analyzing data, suggestions for adapting the CAT to meet individual needs, pluses and minuses of the use of the CAT, and, finally, some warnings on its use.

The process begins with instructors indicating their teaching goals. Attempting to clarify those goals, Angelo and Cross field-tested an inventory form over a three-year period (1987-1990) to help devise a simple, easy-to-use tool. Successive modifications have resulted in a self-scorable instrument that contains 52 goal statements grouped into six clusters, plus one general question on how teachers perceive their own primary role. The aim of the Teaching Goals Inventory (TGI) is to help instructors define what they expect to accomplish in a course.

Once teaching goals crystallize, the next step in the process is the development of individualized, context-specific CATs that provide teachers with information on how close they are to meeting those goals. The choice of techniques is open to teacher discretion, with instructors tailoring choices to individual teaching goals, disciplines, and the background of their students. Flexibility is strongly encouraged at classroom assessment workshops where the motto is "Adapt, don't adopt" (Angelo & Cross, 1993, p. 371).

CATs have the potential to change the classroom dynamic in many ways. First, CATs change the way instructors teach. CATs provide a continuous feedback loop, requiring ongoing adjustments. The feedback from CATs also eliminates many assumptions that instructors have about their classes. Therefore, CATs selected must address factors that a teacher is both able and willing to change (Nilson, 1998). For example, CATs are a simple way to measure innovative teaching practices, which supplement traditional lecturing. Since Stice's 1987 study revealed that as much as 50% of course content is forgotten in a few months after a lecture-based course, other methods of instruction have been introduced. CATs are an effective way for instructors to receive feedback on newly adopted pedagogies. CATs also help faculty concentrate on the pace at which students learn key concepts (Eisenbach, Golich, & Curry, 1998). Second, CATs also have the potential to change the way students learn. They effectively involve students in an investigation of the learning process. Research has shown that people who can look at themselves objectively in the process of learning and analyze what is happening are better learners than individuals who lack that objectivity (Cross, 1998a). Active student involvement in learning is fundamental to learning success (Chickering & Gamson, 1991). Third, CATs affect the relationships between students and teachers, strengthening the bond between them and generating greater student satisfaction. Classroom assessment and CATs are evidence that teachers are concerned with the level of learning, progress, ideas, and opinions. Faculty members find that there is a positive correlation between CATs and students' use of their office hours, and between CATs and course completion rates (Angelo & Cross, 1993).

Angelo and Cross recommend a three-step plan for teachers new to the process of classroom assessment: Start with simple CATs in comfortable classes, explain to students the nature and purpose of anonymous formative assessment practices, and make some changes as a result of what has been learned through these assessments (Angelo & Cross, 1993; Nilson, 1998). In the most successful instances, instructors share their findings with students. This can take several forms: A few minutes at the start of class is spent discussing the results, a prepared handout on the results is distributed for students to read, or a summary of results is written on the board or projected (Angelo & Cross, 1993). This use of CATs is consistent with several principles of good practice in teaching and learning, including active learning, feedback on performance, and frequent student-faculty contact (Chickering & Gamson, 1991; Eisenbach et al., 1998). Lyons, Kysilka, and Pawlas (1999) remind adjunct faculty that informal student evaluations can improve formal end-of-term evaluations and increase the likelihood that they will be asked to continue teaching. "Actively involving students in ongoing evaluation is a strategy that has been employed successfully for decades by instructors committed to continuous self-improvement" (p. 167). Lyons et al. recommend key mileposts in the course when feedback is particularly useful—at the end of the first class meeting, after the first exam, and at midterm.

The extent to which individual instructors use CATs has been the subject of research. The study by Eisenbach et al. (1998) demonstrates the value of using CATs to three professors in three disciplines at California State University at San Marcos. The collaborative investigation of CATs across several content areas yields the following conclusions: (a) Effective teaching begins with clear goals; (b) CATs contribute to self-reflection by teachers and students; (c) CATs have a reciprocal effect on teachers and students as they both remain involved in the learning process; (d) faculty need self-confidence to face negative feedback; and (e) faculty must feel ready to use CATs.

Angelo and Cross (1993) acknowledge that the purpose of their work is to introduce the idea that the classroom can be a laboratory to observe students and study learning as it takes place in an ongoing process. It is hoped that formative feedback will be the impetus to modifications in teaching. The findings of their research lead to two conclusions: Teaching goals in the academic disciplines are distinct from one another, and classroom assessment naturally grows into a social, collaborative learning experience that teachers like to share.

CATs have both private and public dimensions. According to Cross (1998a), "It is a paradox that teaching in higher education is such a strangely private affair. It is learned in private and for the most part practiced in private without much input or conversation with others engaged in the same activity" (p. 11). Classroom research encourages a sense of community as teachers talk with students, exchange experiences with colleagues, and share insights at the departmental or institutional level. This model for using CATs is circular rather than linear. CATs have the potential to move beyond *what* is observed as effective in individual classrooms to a deeper understanding of *why* certain practices are effective. They have the ability to move to a higher level of understanding when the results, including both positive and negative feedback, are shared (Cross, 1995). CATs lead to conversation on learning, but the generalizations that result from these exchanges must be retested in the classroom. Angelo and Cross (1993) never abandon actual classroom environments, where students and teachers interact, as the source of information on learning. The investigation begins there, moves outside for collective sharing and theorizing, and then returns to the classroom for confirmation, modification, or rejection.

Research on the use of CATs has been largely limited to studies conducted by those who introduced the techniques or those who strongly supported them. Steadman (1994), who worked with Cross, looks at the use of CATs at three Northern California community colleges by surveying 56 instructors and 164 students (with tests both pre and post CATs), supplemented by in-depth interviews of 9 instructors and 9 students, plus several classroom observations. The purpose of the study is to describe implementation of CATs, highlight changes in teaching practice as a result of them, and reveal the costs/benefits of using CATs at an institution. A central finding in the study is that instructors use specific CATs to match their own purposes, whether it is to obtain feedback on the effectiveness of their teaching, monitor student learning, or improve communication. In addition, faculty describe the benefits of CATs as improved student satisfaction with the course, student learning, and congenial interaction. The positive aspects of CATs far outweigh the short span of time set aside for them or the reaction to negative feedback. Another finding is that students feel they have a greater voice in the classroom and are more involved in the learning process. However, the results from the pre and post student tests indicate that exposure to CATs does not significantly help students with their study skills; a recommendation of the study, therefore, is to encourage faculty to capitalize on the potential of CATs to help students learn how to learn.

One researcher looks at barriers to changed instructional practices. Concerned that research is having little impact on teaching practices, Cuevas (1991) surveys 81 faculty members and administrators who have successfully completed a staff development course on classroom research at Miami-Dade Community College. To judge the continued implementation of what is learned, Cuevas chooses a grassroots approach to the research and reviews a random sample of 27 classroom research projects, which are an additional requirement of the course. Eighty-five percent of the classroom research projects conducted are adaptations of the Angelo and Cross model of CATs. Cuevas' study finds classroom research activities have a greater impact on teaching than on students' learning skills. The findings also show that classroom research leads to the planning of new, challenging, follow-up instructional activities; its value far outweighs the time and effort to implement the assessment techniques. Therefore, Cuevas raises the question of how to involve faculty for whom time spent on classroom assessment is a barrier.

Sporadic studies by researchers over the past decade continue to look at the effects of CATs on faculty and students. These include Catlin and Kalina (1993) who conduct a study of the relationship between student outcomes and the use of CATs at eight California community colleges. The researchers compare retention, grade distribution, and classroom environment in classes that use CATs and those that do not. Study findings show that student retention, plus student reports of involvement, satisfaction, and understanding increase in courses with CATs. That same year, Kelly (1993) evaluates the effectiveness of CATs and interacting teaching methods in promoting student learning, student involvement in learning, course completion, and faculty involvement in teaching. Kelly purposefully selects part-time and evening faculty at Fullerton Community College. The study does not confirm conclusively a positive effect of either on learning outcomes, involvement in learning, or retention. She does find, however, that community college faculty take a greater interest in their teaching after exposure to classroom assessment. This involvement is demonstrated in two ways:

Faculty start to rethink the way they teach as a result of student feedback, and this rethinking leads to refinements or changes. Faculty learning groups prove to be an impetus to making changes. Kelly comments, "It seems logical that if group learning is effective for adult learners, it should also be effective for faculty, as adult learners, who want to learn new teaching methods" (p. 196). She recommends both the use of CATs and the formation of faculty learning groups.

Looking at CATs from another perspective, Dozark (1998) studies the effects of two instructional alternatives in the classroom, including cooperative learning (CL) and CATs, on student satisfaction across a wide range of courses at a comprehensive community college. His study looks at these two quality practices as ways to implement Total Quality Management (TQM) in higher education. Actions taken by faculty members, the service providers, must ensure high quality and "customer satisfaction." A survey of 368 students, drawn from a college population of 10,000, shows that CL is somewhat effective at increasing student satisfaction, while use of CATs shows a very marginal increase. This study does not investigate the effect of CATs on instructors or on improved instructional techniques as a result of formative assessment. Most recently, Gaeddert (2001) provides insight into improving graduate theological instruction through qualitative inquiry of professors' attitudes toward the use of CATs. Seven faculty members are gathered in a focus group and introduced to two examples of CATs; six weeks later each faculty member is interviewed individually to discern attitudinal change toward CATs. The goal of Gaeddert's study is to design faculty development materials to train professors at Covenant Theological Seminary. The research reveals that the participants find CATs to be a valuable tool, well worth the investment of time.

Exposure to CATs results in substantial attitude changes. The value of studying attitudes toward the use of CATs is highlighted in this study; qualitative inquiry adds to the depth of the findings, conclusions, and recommendations.

In 1998, Steadman condenses much of what has been learned about CATs from both instructor and student viewpoints. The advantages of CATs for instructors, according to Steadman, are the ability to tune into student voices, the opportunity to reflect upon teaching practices and systematically change them, the ability to increase student involvement in learning, and the chance to join a community of faculty committed to teaching. Disadvantages include the time involved and the potential for negative feedback.

Classroom assessment (the "what"), classroom research (the "why" and "how"), and CATs (the specific, in-class feedback) encourage faculty members to design teaching and learning experiments in their own classrooms, elevating the individual teacher to a researcher with regard to pedagogy. "The idea behind this movement is that not only would we all learn things that work, and do not work, with regard to learning and teaching, but a corporate body of knowledge would also be generated upon which theory could be built. This comparatively recent innovation is yet to prove its merit" (Blackburn & Lawrence, 1995, p. 220). Investigating use of CATs by community college adjunct professors will indicate the extent to which the results anticipated by Angelo and Cross are materializing. Thus, the history of reform in teaching and learning is an important aspect of this discussion.

The Reform Movement and Assessment for Improvement

Prior to the 1980s, attempts to improve teaching and learning in higher education include the following: (a) Off-campus studies are conducted by researchers in the field of education using federally sponsored research and development centers, and (b) on-campus growth occurs in the area of faculty development, often resulting in the creation of an office dedicated to working with faculty toward the improvement of teaching. Despite these efforts, deep concern for student learning at all levels of public education is triggered by the publication in 1983 of *A Nation at Risk* by the National Commission on Excellence in Education (Lazerson, 2000).

In order to remedy the problems cited in that report and to stem the tide of criticism increasingly directed at higher education, efforts in the 1980s and 1990s are made in two key areas: (a) A reform movement is generated by educators who place teaching and learning center stage in the transformation of institutions of higher education; and (b) assessment emerges as the principal way of making institutions accountable for student learning (Lazerson, 2000).

Among the reformers who bring the issue of student learning to the forefront and believe that students' learning is the "end" that has to be improved is Alexander Astin from the University of California, Los Angeles. He supports the concept of "learning environments" and proposes that assessments of institutional quality are flawed when they measure only curricular content or graduation rates and disregard the "value added" to student learning. Inspired by Astin's ideas, Derek Bok, as President of Harvard University, feels that colleges and universities have to demonstrate the way in which they add to students' knowledge. Bok places Richard Light, a statistician at the graduate school, in charge of the Harvard Assessment Seminars for four years (1986-1990), with two dozen or more colleges participating. This research looks at innovations in teaching and results in two reports. The Light Reports advise the following: Pay attention to student learning, stimulate interaction among students, respond quickly to their work, and ask them frequently to assess what they have learned (Lazerson, 2000).

Another key reformer is Ernest Boyer, former president of the Carnegie Foundation for the Advancement of Teaching, who elevates research on teaching and learning to a new level with the publication of *Scholarship Reconsidered: Priorities of the Professoriate* in 1990. Boyer conceives of scholarship in four basic areas: (a) scholarship of discovery (research); (b) scholarship of integration (connections across the disciplines); (c) scholarship of application (utilization of knowledge); and (d) scholarship of teaching (transmission of knowledge in order to extend knowledge). Viewing teaching as an intellectual act that contributes to the transformation of knowledge, Boyer reconceptualizes teaching as a scholarly activity. Researching effective teaching takes its place alongside traditional ideas of scholarship in higher education, namely research and publication. In fact, it is suggested that the growing body of information on teaching can organize itself into a distinct field of inquiry.

At the same time, an assessment movement, also generated by concern for a nation "at risk," grows significantly as institutions conduct extensive internal audits on quantifiable learning outcomes and participate in intercollegiate forums on the topic of assessment. Increasingly, the link between assessment and funding or allocation decisions puts pressure on institutions to measure student performance and prove themselves effective through data collection and analysis. In fact, the demands of outside agents, including state legislatures and accrediting agencies, begin to strain college resources (Lazerson, 2000).

By the mid-1990s it is obvious that assessment for accountability has not altered undergraduate education in actual classrooms. Lazerson (2000) comments that the assessment movement is "both flourishing and in shambles" (p. 13); assessment is an observed ritual, but one without significant impact. Notwithstanding the extensive list of reports, grants, and research projects, the improvements in American undergraduate education are negligible (Marchese, 1995).

The substantial disjuncture between assessment for accountability and actual practice is further confirmed by the 1999 published findings from a research study conducted by the National Center for Postsecondary Improvement (NCPI). This is the first national survey to examine the nature, extent, and impact of student assessment strategies on college campuses (as cited in Revolution or Evolution? Gauging the Impact of Institutional Student-Assessment Strategies, 1999). A survey of chief academic officers at approximately 1400 public and private colleges and universities examines how a variety of institutional types support, promote, and use student assessment data to improve learning and institutional performance. The results show considerable institutional activity to collect data, yet the primary reason cited by the institutions for conducting assessments is for accreditation purposes. The most disappointing finding of the study is that there is little correlation between assessment and either academic decision making or efforts to improve instruction in the classroom. Even more disappointing is the effect of student assessment on faculty decision making. Revisions by individual teachers and by institutions are not significant.

That same year, the NCPI publishes a separate report, which specifically addresses the effect of student assessment on institutional strategies at community colleges (Peterson, Augustine, Einarson, & Vaughan, 1999). The findings of this study also show that preparing a self-study for accreditation is the most important reason for this group of institutions to engage in student assessment, and they are least likely to use assessment as a means of improving instruction or allocating resources. Grubb et al. (1999) further expand concern for teaching in community colleges. Their research includes direct observations of 257 community college classrooms in 32 colleges in 11 states, supplemented by instructor and administrator interviews and review of documents, including syllabi and exams. The study's descriptions are highly critical, characterizing the "distressed" classroom as one in which there is animosity between students and instructor, and the "collapsed" classroom as one in which the students are so indifferent that they accept anything the instructor says. The study warns that community colleges may aspire to create "teaching cultures," moving beyond an examination of teaching methods and techniques to probe deeper questions and to make those concerns public, but the measure of success is mediocre at best. Institutional indifference to teaching is cited as a major cause of the collapse in teaching quality. The researchers suggest that teaching and learning must be a central, highly rewarded activity on campus. Lazerson (2000) refers to the studies by the NCPI and Grubb as "jolting revelations" that signal the need for further reform; they also show the frailties of externally imposed change.

An area needing further exploration, therefore, is the role played by assessment. Since the early 1990s, the nature and purpose of assessment has undergone reexamination. This has resulted in a newly realigned movement that joins assessment for accountability by state and accrediting agencies with assessment for improvement. The latter looks at feedback within the classroom setting as the definitive way to learn about teaching. Assessment is better understood as an ongoing process to both understand and improve student learning, and then document the outcomes. In this context, change is not externally mandated; it is generated internally by faculty committed to better understanding their own teaching practices in order to improve student learning in their classrooms.

At first, concern for improved classroom learning generates innovative, concrete ways to amend teaching practices. To improve the outcome, there is a general re-examination of the means of teaching. The result is a mix of new methods, including collaborative and cooperative learning, technology-based teaching, service learning, role playing, and learning communities. Not unexpectedly, faculty often respond reluctantly; the call for improved teaching seems threatening, just like many other externally mandated bureaucratic demands. At research universities, improved teaching becomes a type of second job piled on top of many others; at community colleges, improved teaching is also considered an additional burden or "extra" (Marchese, 1995).

Changed methods of instruction prove to be only the beginning; in time, the emphasis becomes something much deeper because the key to change is carefully identifying the source of the initiative and the motivating factors that lead to improved teaching (Marchese, 1995). Unlike external pressures on teachers, assessment becomes a personal and professional ethic embraced by instructors who work toward changed practices. Marchese proposes "an ethic of continuous improvement" (p. 45) with good teachers constantly advancing their craft.

As a result, current literature increasingly looks at assessment as a transformative, not an additive, process. Assessment is a tool to improve student learning; it is more than the measurement of what has already transpired. It is dynamic, interactive, constantly changing and evolving. Instrumental in this changed outlook, Cross moves the locale of assessment, bringing it from assessment "experts," administrators and legislators who reward performance, to the teachers who are now empowered to design assessments that are valuable to them and can be realistically used by them. Teachers, not "other people," are the experts on teaching and learning (Cross, 1990.)

Moving away from a premise of deficiency and remediation, the new emphasis is on personal opportunity. Setting improved student learning as the ultimate goal, teaching becomes the tool that makes learning possible. Similarly, research on teaching in higher education is no longer confined to an investigation of techniques that are helpful, since "emphasis on technique trivializes the rich complexity that is the situated knowledge of teaching contexts and circumstances" (Menges, Weimer, & Associates, 1996, p. 5). More broadly, research on teaching is a way of "documenting, describing, and integrating the wisdom of practice that celebrates the collective experiences of countless practitioners" (pp. 6-7). Menges et el. argue that this is an untapped area of information and ideas.

According to Menges et al. (1996), the underlying purpose of research is to organize findings and make them accessible to others so instructors can teach and learn from each other. Descriptions of good practice become the foundation for shared experiences, and teaching in higher education is viewed in a much larger context. In time, careful descriptions of good practice grow into a body of knowledge. The "collective experience" is the backdrop for informed practice by individual teachers. This is referred to as the "wisdom of practice" (Menges et al., 1996, p. 6). The intention of recent research is not to threaten or intimidate, but to motivate, excite, and inspire. Researchers are now exploring the possibilities of pooling collective teaching experiences and wisdom of practice into a shared scholarship of teaching.

Scholarship of Teaching

Scholarship of teaching is thinking about teaching in a scholarly way so that student learning is continually improved. The goal of the scholarship of teaching is to improve one's own classroom and add to a public core of ideas. It begins with "evidence gathering" or classroom assessment, then invites peer collaboration and group reflection; it becomes "public, open to critique and evaluation, and in a form that others can build on" (Hutchings & Shulman, 1999, p. 12). The scholarship of teaching is a concept which is fluid, has evolved from several historical strands, and is still being invented (Hutchings, 2000b). Lee Shulman elevates teaching to a scholarly enterprise when he first develops the idea of "pedagogical concept knowledge," a combination of expertise in one's field with some background in pedagogy (Theall & Centra, 2001). Ernest Boyer (1990) further advances the idea of a scholarship of teaching when he values it as an intellectual enterprise on par with other areas of scholarship, including discovery (research), integration, and application. *Scholarship Assessed,* published seven years later, bolsters Boyer's ideas (Glassick, Huber, & Maeroff, 1997). The scholarship of teaching is now held up to the same standards of excellence as those found in other areas of serious investigation: clear goals, adequate preparation, appropriate methods, significant results, effective presentation, and reflective critique.

Although the literature abounds with books on successful teaching tips and techniques, the scholarship of teaching moves beyond concrete methods to a higher level of inquiry. Rather than focusing on the mechanics of teaching, Weimer (2001) suggests looking at practices in more "reflective, complex, and substantive ways" (p. 47). She writes, “We need something in addition to techniques. We need an approach that comes to reflect an integrated, coherent philosophy of education and one with enough intellectual muscle to work on the problems we face” (Weimer, 2002, p. 186).

There are numerous definitions of the scholarship of teaching. Richlin (2001) defines it as "formal, peer-reviewed communication in the appropriate media or venue, which then becomes part of the knowledge base of teaching and learning in higher education" (p. 58). Huber (2001) comments that the scholarship of teaching and learning is varied in content and form, ranging from systematic inquiry that is well documented, published, or presented at conferences, to personal reflection that is shared with campus colleagues. Kreber (1999) similarly sees scholarly activity as a combination of research-based knowledge mixed with reflection by individual instructors on their own practices. Shulman (1999) believes that researching one’s own teaching practices is at the heart of the teaching profession, and that the scholarship of teaching brings those discoveries to another level by making them public, open to critique, and available for others to build upon. In 1992, Boyer furthers his conceptualization of the scholarship of teaching as an enterprise that is not a separate activity, but is a blending of the other three forms of scholarship, including discovery, integration, and application.

Despite their variety, definitions of the scholarship of teaching focus on an essential issue: The scholarship of teaching always begins and ends with an individual professor in an individual classroom. According to Hutchings (2000b), who defines the scholarship of teaching as a systematic investigation by faculty of questions relating to student learning, the information is always drawn from concrete situations confronted in particular classrooms by individual teachers. It moves in the direction of "going meta" but maintains strong roots in the particular settings from which it grows.

The scholarship of teaching is built upon several basic beliefs. First, teachers are learners (Boyer, 1991). It is undertaken by each faculty member or "first person" who looks at his or her own practices (Hutchings, 2000a). Shulman (2001a) describes a true scholar as a well-prepared professional, someone who not only does the work but also regularly reflects on it.

Second, the scholarship of teaching is not the search for one right way to teach, but the constant search for ways to improve (Bass, 1998). Hutchings (1999) states that the scholarship of teaching is not a science and does not lead to one "immutable general truth." Classroom research is one way to be involved in the scholarship of teaching (Paulsen, 2001). Yet, classroom research is not the search for one set of universal practices. Unlike educational researchers who use a scientific model in their quest for prediction and control, classroom researchers are seeking insight and understanding. "Classroom researchers, for example, are not looking for a law of human behavior that will provide an if/then formula that will tell them that if they teach in a certain way, then a certain kind of learning will occur. . . . They want to know what works, of course, but they are even more interested in knowing why it works. They want to understand learning as a process, and they consider insights as important as findings" (Cross, 1990, pp. 129-130). This open-ended search operates on many levels as every college is a "mosaic of faculty talent on the campus" (Boyer, 1992, p. 92).

Third, the scholarship of teaching is a process. This is often referred to as the "moving target" or the "changing script" because the investigation itself changes what is being investigated. Fourth, the scholarship of teaching is transformational because it has as its goal significant, long-lasting learning for all students and stronger and more effective pedagogies for teachers (Hutchings, 2000a).

Another area of agreement is the public nature of the scholarship of teaching (Galyan, 1999; Pittas, 2000). Shulman (2001b) includes in his definition of scholarship the responsibility to exchange and share ideas. "This commitment is essential because the work of the community transcends the ability of any single scholar or teacher to do it" (p. 103). He also states that taking teaching seriously and making it a central concern of higher education is strongly tied to its status as community property and "going public is the ultimate test of the quality of an idea" (p. 103). Similarly, Bass (1998) describes the scholarship of teaching as investigation followed by communal, professional conversation. As teaching becomes community property, pedagogical solitude is replaced by collegiality (Pittas, 2000).

There is a strong slant in the literature toward a connection between the scholarship of teaching and the individual disciplines. Shulman (1993) proposes that the scholarship of teaching is an extension of an instructor's deep understanding of a discipline and an awareness of the way that understanding develops; effective approaches vary according to academic subject area.

Other writers prefer a definition of the scholarship of teaching that is less discipline-based (Kreber, 2001). Pedagogical content knowledge moves to a higher level when instructors examine learning goals that are cross disciplinary, such as critical thinking, effective verbal communication, and self-regulated learning. According to Huber (1999), there is a common ground for discussion that reaches across disciplines. Hutchings (2000a) refers to the power of collaboration across various disciplines to increase the amount of sharing and to see teaching from a multitude of perspectives. In her studies, she observes "a good deal of methodological borrowing and influence across fields" (p. 7). For Cambridge (1999), the research methodology in the scholarship of teaching and learning is mostly discipline-specific, but in time the research findings may reach across and bridge the disciplines. Huber and Morreale (2002) caution that inquiries into teaching and learning may be limited by a particular discipline's mode of investigation, imposing the methods typical in that field onto the scholarship of teaching and learning. An openness to a variety of approaches, borrowed from many disciplines, is very beneficial. "The challenge here is to reconceptualize relationships between the disciplines, so that the lessons flow in all directions rather than demanding the diffusion of one privileged way of knowing" (Huber, 1999, para. 28). Ultimately, the disciplines become more comfortable with each other, developing what is called "trading zones" or overlapping areas; in these zones there is collaboration, borrowing, and sharing (Huber & Morreale, 2002).

The scholarship of teaching is a unique and rapidly expanding area of inquiry; it is also distinct from scholarly teaching. The former is the process of making the investigations of teaching by individual instructors accessible to others; the latter is the impact of teaching activities on student learning. Richlin (2001) comments, "The scholarship of teaching, in my view, builds on the end product of scholarly teaching" (p. 61).

Barriers to the scholarship of teaching are evident in the literature. Shulman (1999) says that getting higher education to take student learning seriously is one of the hardest tasks he has ever undertaken; yet in 1998, he establishes the Carnegie Academy for the Scholarship of Teaching and Learning (CASTL) to develop conceptual models of teaching as scholarly work, and in alliance with American Association of Higher Education (AAHE), to work with colleges directly. Weimer (2001) pinpoints five problems that impede the development of a knowledge base related to teaching and learning: (a) lack of concern for the "larger reasons" for successes and failures; (b) common assumption that expertise in the content area automatically qualifies an individual to teach, or "if you know it, you can teach it"; (c) failure to realize that successful techniques and approaches do not work in all contexts and that the varying characteristics of teachers, students, content, and context do matter; (d) lack of a feeling of professional obligation to record or pass along to other instructors what has been learned by experience; and (e) reliance on assessment measures that do not give valid feedback on instruction or the lack of any benchmarks that reflect what we mean by good practice.

Recommendations have been made to overcome these barriers. Weimer (2001) suggests assessment criteria on teaching and learning so that the dialogue will be more meaningful, additional articles in pedagogical journals to share knowledge, and models of the scholarship of teaching that go beyond a single classroom or discipline. Similarly, Smith (2001) does not want the scholarship of teaching to remain an unorganized mix of ideas and, instead, suggests that inquiries into teaching and learning should be "public to some audience, permanent in some way, and judged to be scholarly by some community of practice" (p. 71). Weston and McAlpine (2001) envision a continuum of growth consisting of three phases that result in a scholarship of teaching. The process begins as personal investigation, moves on to public exchange, and culminates in a comprehensive body of knowledge published or presented in some way to inform others.

An example of the scholarship of teaching is Pat Hutchings' recently published *Opening Lines: Approaches to the Scholarship of Teaching and Learning* (2000a), which includes eight case studies—lengthy discussions with professors, both full-time and adjunct, in a variety of disciplines at different types of institutions of higher education. Each case is a personal reflection on the specifics of methodology and institutional support mechanisms, as well as the challenge of participating in the scholarship of teaching despite feelings of vulnerability. The book itself is an example of public dialogue on teaching and learning because each case sparks conversation. As universal or "global" questions surface, so do the areas of uncertainty where further inquiry is necessary.

A positive result of the scholarship of teaching is that specific words have been assigned to what once was a vague body of ideas. According to Phillips, one of Hutchings' eight case studies, "Naming is a way of valuing" (Hutchings, 2000a, p. 77). Phillips advises instructors to go "meta" slowly and reflectively: "Be prepared to discover that the work raises more questions than it answers. This is good because the fact is that we don't really know much about what goes on in classrooms" (p. 79). Another positive result is to take a closer look at faculty at work. According to Blackburn and Lawrence (1995), studies of faculty in the teaching role traditionally examine the relationships between indicators of teaching effectiveness (almost always student ratings) and contextual variables; they are too often overwhelmingly descriptive, "a kind of Gallup poll of faculty demographics and opinions" (p. 11). In contrast, their study of the complex nature of faculty behavior is built on a theoretical framework that addresses faculty self-evaluations, sense of efficacy, and perceptions of the environment. To better understand faculty motivation, Blackburn and Lawrence test their theoretical framework using quantitative data collected from many types of colleges and universities, but the items in their surveys are qualitatively generated. The purpose of their study is to better understand how faculty members behave and why they choose those behaviors. The theoretical framework integrates motivation theories with research on faculty. The authors envision their work as part of a larger body of inquiry that looks at professionals at work in organizations. Also, their study attempts to go beyond traditional research on life in the academic world, which analyzed either organizational features or personal factors. Some of the study's findings relate to community colleges, revealing that interest in teaching is greater for community college professors as compared to college faculty in other types of institutions, and they rate themselves above average in competence in teaching. Another finding is that professors in the humanities at all types of higher education institutions, including community colleges, are more committed to intellectual development and to the liberal arts; natural scientists are more concerned about course content and transferring information from themselves to their students. More general findings of their study confirm the complex nature of the interaction between the individual professor and the college environment. Individual behaviors change higher education institutions, and individual perceptions of a work environment affect behavior. Accordingly, new structures and practices create changes in behavior. The study shows that "faculty behavior is a dynamic process, not a static set of conditions" (p. 288).

Qualitative inquiry is the choice of methodology for Kelly-Kleese (2001), who conducts a case study at a technical community college to create an ethnographic picture of the issues surrounding community college scholarship. Using interviews and document review, the researcher investigates how community college administrators and faculty members define scholarship and what methods are used for the production of scholarly work. The findings of the study show that scholarly activities by community college faculty do not fit the traditional definition of scholarship as research in a discipline; instead, scholarship can better be described as scholarly discourse, often valued by its ability to improve teaching and learning at the institution. Scholarship is process rather than product; scholarship and teaching at the community college go together. Examples of scholarship vary by college and may include a published article or experimentation with a new instructional method. Teaching and learning centers and professional development are also evidence of scholarship. Community college scholarship is defined in her study as staying current in one's field and passing that information on to students, scholarly teaching as the use of that body of knowledge, and the scholarship of teaching as the shared body of knowledge about good teaching. Researching the changing, fluid definition of the word "scholarship," Kelly-Kleese contributes to the image of a community college as a scholarly place. She opens the door to an investigation of the term "scholarship of teaching," including Shulman's definition, at community colleges. The author states in her recommendations for more qualitative studies on community college scholarship as the word scholarship continues to be redefined. Since her study includes some part-time instructors, limited to those who work at least 30 hours a week, adjunct faculty contribution is recognized and valued. The researcher sees great potential in community college scholarship, both for these institutions and for higher education in general.

In a college where teaching is valued as scholarship, there is shared interest about such topics as learning and student outcomes. From these public discussions a web of beliefs and behaviors connects those involved in the organization. The scholarship of teaching can begin here, and a well-established faculty development program is often the binding connection.

Faculty Development Programs at Community Colleges

Faculty development, as defined by Gaff (1975), is the process of "enhancing the talents, expanding the interests, improving the competence, and otherwise facilitating the professional and personal growth of faculty members, particularly in their roles as instructors" (p. 14). Gaff distinguishes faculty development from instructional and organizational development in its focus on faculty members individually, whereas instructional development concentrates on course design and learning materials and organizational development looks at the group environment. Gaff acknowledges that all three approaches facilitate in different ways the improvement of instruction. Their interrelationship is evident by the tendency of individuals to revert to older ways of teaching if the changes they make are not institutionally supported. Gaff explains that the basic assumption of faculty development is that the instructional behavior of a faculty member is a "learned complex" of knowledge, attitudes, values, motivations, skills, and sensitivities; faculty members can learn how to improve. He also believes that the conceptual framework underlying faculty development supports the idea that faculty members are the most important educational resource of a college or university.

According to Roueche et al. (1995), faculty development remains one of the least prominent agenda items in most American institutions of higher education. This is particularly inconsistent with the strong focus on teaching and learning at community colleges. Grubb et al. (1999) advise that community colleges focus less on the "means" of education, including funding or political control, and more on the "ends" of education, specifically learning by students and the facilitation of that learning by their instructors. According to Miller (1997), "If the primary expectation for community college faculty is that they will teach, it seems reasonable to expect that considerable institutional resources will be directed toward developing faculty's basic instructional methodology skills, particularly those aimed at the adult student. . . . if this is not accomplished in preservice programs, the burden falls on the community college faculty development office" (p. 89).

The processes that make up faculty development in higher education have changed over time. According to Alfano (1994), community colleges have always had some type of formal or informal faculty development activities; in the first half of the 20th century these were similar to inservice training in K-12 systems. However, in the 1970s, as the nature of the student body changed with expanding enrollment, it was apparent that faculty development programs needed to expand their agenda (Alfano, 1994). According to Roueche et al. (1995), the challenge should be met by keeping instructors up-to-date in the field of education, informing them of the philosophy of the community college, broadening their understanding of community college students, providing orientation activities for new instructors and renewal activities for others, and encouraging the sense of a college community. Similarly, Gibson-Harman et al. (2002) warn, “If a learning revolution is to take firm root and endure, community college leaders will need to devise creative and cost-effective strategies to prepare faculty to embrace new professional roles that few have preciously enacted let alone seen modeled elsewhere” (p. 82).

Faculty development programs vary considerably from one community college to another (Roueche et al., 1995). Cohen et al. (1994) advise that programs have explicit goals so they do not function without direction. "Some plotted course of improvement rather than either stagnation or mere change for its own sake is desirable" (p. 370). Although exact goals are not universally agreed upon, it is generally felt that evidence of the results is the impact of the program on individual professors in their classrooms. Oromaner (1998) recommends a frequent "revisiting" of the who, what, where, and how questions of faculty development programs to mirror changes in institutional environment, mission, goals, and resources.

Another common thread of faculty development programs is the mix of activities, with progress accomplished through either group projects or individual efforts. The methods used to learn about teaching are open to debate. Accordingly, institutions arrive at their own decisions on appropriate faculty development activities, programs, and staffing (Alfano, 1994; Bakutes, 1998). Suggestions from the Derek Bok Center at Harvard University include a rich variety of activities—orientation every semester, new faculty orientation, workshops, course consultations, videotaping and analysis, practice teaching sessions, and discussion-oriented luncheons and dinners (R. Olivo, personal conversation, July 25, 2001).

Institutional commitment to faculty development has resulted in a proliferation of teaching and learning centers at colleges across the country. Bakutes (1998) stresses that improved teacher effectiveness in the classroom is one of a learning center's primary goals. As a relatively new concept, a center usually consists of a room or complex of rooms set aside for casual as well as planned activities relating to instruction. It is generally a multi-purpose resource for ideas and skills that relate to course content and the use of technology, but it also has the expanded agenda of exploring teaching and learning across the curriculum. Location at an accessible and convenient place on campus makes the learning center more useable; it should include a lending library of books and articles, and provide a walk-in clinic for problem situations that require immediate attention (R. Olivo, personal conversation, July 25, 2001).

Research on the success of faculty development programs shows that expectations are not being met. Miller (1997) states that faculty development programs have demonstrated limited success, although they use valuable resources within each institution. This lack of accomplishment is due to programs that are fragmentary, disorganized, and receive minimal institutional support. In 1999, Murray conducts a national survey of more than 100 community colleges concerning their professional development programs and finds a glaring lack of commitment on the part of leadership for faculty development, resulting in a disorganized, "patchwork" approach. Murray observes that faculty development in general has been a movement in higher education for 30 years, "the effects, however, are hardly visible in college classrooms" (p. 47).

Two factors are cited as fundamentally important to faculty development for programs to move in a more positive direction. First, according to Eble and McKeachie (1985), programs must be well integrated into the fabric of the institution. Activities must be regular and continuous. One-time activities must be reinforced for long lasting effects. Second, according to Roueche et al. (1995), the faculty must be motivated to participate. Success can only be measured by the impact of the program on individual instructors in their classrooms (Cohen et al., 1994). The importance of individual motivation is frequently addressed in the literature. Some writers feel that personal motivation is a resource which can be tapped by appealing to personal or professional goals that individuals set for themselves. The ultimate purpose of faculty development is necessarily linked to the desire for personal growth, which eventually leads to professional growth. Cross (1998a) observes that faculty have strong responses to intrinsic motivators. Others argue that personal motivation needs bolstering. Kraft (2000) recognizes that the motivation for teachers to open themselves to the possibility of change is not automatic and requires institutional support. "Departing from the familiar requires constant support and reassurance. So there must be a safe place for free and open talk" (p. 53). Programs that seem punitive will meet with resistance; those that look at improvement as long-term personal commitment will appeal to a much wider audience.

Classroom research has a unique place in faculty development programs because it has both private and public dimensions. Classroom research takes place in the individual classroom, yet introduction to it and follow-up discussions are both more openly public. Cross (1990) sees this as a challenge; she states that classroom research has its own built-in incentives because it is intellectually challenging, promotes discussion, and enhances the satisfaction that goes along with teaching. When introduced in a development program, CATs meet the criteria of ongoing activities requiring personal motivation. Cross makes other concrete recommendations: (a) Devise a promotion/tenure system that recognizes teaching performance and the use of professional activities, i.e. classroom research; (b) support opportunities for teachers to use classroom research and share these experiences with others; (c) provide occasions to participate in faculty development activities or attend professional conferences; and (d) promote recognition for participation in professional development activities.

Shared experience is one of the strongest incentives to participate in faculty development activities. Purdy (1973) conducts an in-depth study of community college faculty and finds that instructors often ignore information presented at orientations or seminars unless colleagues have already tried and tested the technique. Purdy concludes that colleges that value change need to provide frequent opportunities for exchange and interaction among faculty. In more recent times, Steadman (1998) makes several recommendations for new directions in faculty development programs to promote interaction and discussion. She suggests (a) discussion groups or classroom assessment projects that last an entire semester or longer to reflect on the purposes of CATs; (b) training for faculty on the relationship between cognitive learning theory and CATs; and (c) reflection on the purposes of CATs as they relate to the creation of a classroom assessment community.

Concrete recommendations for faculty development programs have been made over the past decade; yet good intentions do not qualify as real change. As a result, O'Banion et al. (1994) advise extending faculty development opportunities to the widest possible audience, made up of both full-time and part-time faculty, and offering a range of extrinsic and intrinsic motivators because of the investment of time and energy. Pierce (1998) strongly suggests that faculty development programs practice what they preach; contradictions between what is said and what is done will discredit a program. Based on his survey, Murray (1999) advises that faculty development programs become goal-directed, structured, connected to a reward structure, and valued by administrators. Faculty development programs should be faculty owned and provide support from colleagues on the importance of revisiting the topic of teaching improvement.

Most community college faculty development programs address full-time faculty (Alfano, 1994). Although they are not intentionally designed to overlook adjunct faculty, programs do not draw substantial participation since part-time faculty are paid for the hours they teach. Instead, a common approach is to expose adjunct faculty to a variety of topics during a brief orientation session, which is often a requirement (Avakian, 1995; Greive, 1999). Gappa and Leslie (1993) find that faculty development programs directed at adjunct professors vary from well-established programs to no program. Some institutions provide voluntary access to opportunities; others require participation. Gappa and Leslie conclude that professional development of part-time faculty is "one aspect of integration that needs to be more fully considered" (p. 200). One possibility, suggested by Lyons (1999), is a multi-session teaching methods course for all new adjunct faculty in addition to departmental orientation, followed by mentoring with a more experienced, "veteran" faculty member.

Two recent studies provide an overview of faculty development in general at two-year colleges. Loumos-Kennedy (1996) looks at effective faculty/staff development practices that have the potential to keep two-year colleges vital teaching and learning centers. A qualitative research methodology, consisting of a comparative case study, is used to understand those characteristics which are perceived to be high quality. This study specifically looks at best practices. In a more sweeping study, Grant (2000) surveys the individuals responsible for faculty development at 300 randomly selected community colleges for the purpose of determining faculty development practices affecting full-time and part-time faculty. Although 90% of the 232 colleges responding have programs, 50% of those programs are less than 10 years old. Significant differences are found among colleges according to their size and accreditation region. An interesting finding is that large colleges are more likely than small colleges to invite part-time faculty to participate in development, but less likely to require them to attend activities. This study reveals the range of faculty development programs at community colleges across the country; the differences, however, are not evaluated for their effectiveness or impact on teaching and learning. The study looks at faculty development from an administrative standpoint, identifying practices and measuring participation, but does not probe faculty for their responses to those practices.

Several studies in the 1990s look at what is available for adjunct faculty development. Ellis (1990) investigates whether community colleges are taking the necessary steps to provide part-time faculty with opportunities for growth and development. His study concentrates on "what are and what ought to be" the provisions. Ellis surveys both staff and program development administrators and the college officials in charge of staff development activities at 17 Florida public community colleges to determine the current opportunities for part-time faculty, availability of funds, commitment to activities, topics (both actual and desired), delivery systems used, and problems (past, present, and anticipated). The survey results show that one half of the responding institutions have a formal system of staff development for part-time professors; colleges that have a program show a high degree of commitment to its success. Interestingly, commitment to the need for staff development for part-time faculty is highest among administrators, followed by full-time professors, and then part-time professors themselves. Low interest on the part of part-time faculty is a strong finding. Ellis hints that the reason for this modest level of commitment is concern for unequal pay and lack of benefits. The study also reveals that many upper management administrators are involved in the activities; however, it is also apparent that planning is done with very little input from part-time faculty. The study finds that content and delivery are the same for full-time and part-time faculty, with most of the activities directed toward performance in the classroom rather than other content areas, such as community college philosophy or student profiles. The subject of teaching and learning at the community college, a topic of relevance for adjunct faculty, meets with modest response. Although the study investigates the conditions that exist, it never resolves the "why" questions and leaves open the issue of adjunct faculty participation.

Another researcher prefers a more limited site plan and surveys 116 part-time professors from one campus of a multi-campus community college. Vitale (1995) studies the professional development and support services needs of community college part-time faculty in relation to teaching and identifies the preferred methods used to meet those needs. The findings of the study reveal that respondents are dedicated to keeping up-to-date in their disciplines, yet also want to increase their teaching skills, preferably through workshops and seminars rather than orientation meetings at the start of each semester. There is expressed interest in helping to plan these activities as well as a general desire to be more involved with department/division meetings and curriculum development. Although limited to one campus, Vitale's study does research adjunct faculty responses to an existing program; reveal barriers, such as time and location of activities; and explore prospects for change.

Moving beyond broad description to investigate the specific situational factors that influence staff development for part-time faculty, Valent (1992) conducts a study at Alpha County Community College. One goal is to determine the degree of congruence between the perceived staff development needs of part-time faculty and those of the administrative supervisory personnel who organize the activities. The study finds that if adjunct professors are to play a significant role in the instructional process of the college, and if staff development activities are seen as the primary vehicle for enhancing that role, then quality staff development depends on communicating openly and addressing the needs and concerns of adjunct faculty stakeholders. The study concludes that in order to reach institutional goals, the college must continually seek to enhance instructional processes, particularly among part-time faculty. Adjunct professors should benefit an institution academically as well as economically. Otherwise, "insufficient support and unfulfilled expectations may influence the quality of teaching in the classroom and the quality of education in the institution overall" (pp. 255-256). Valent does recognize that the identified factors are applicable to a specific college, and that she has conducted a context-specific needs assessment. However, her review of the literature leads her to believe that her recommendations may have broader application.

Other researchers prefer to look at the effect of faculty development activities on actual instructional practices. Their concern moves beyond an accounting of the number of opportunities for adjunct faculty to looking for evidence of change. Often this involves pre and post testing of faculty when a workshop introduces a new technique. For example, Davis (1995) investigates the effect of a pedagogically based staff development program concentrating on the application of microskills in lecturing and questioning by adjunct faculty at Frederick Community College. Ten adjunct professors are exposed to a staff development workshop and observed for changes in teaching style. On a much broader level, the study attempts to determine whether there is an overall paradigm shift toward the issues of student learning. The study reveals the importance of individual readiness to change on the part of teachers and students. For teachers, readiness includes the ability to question personal beliefs about teaching and the desire to work toward better teaching. "Asserting or forcing change on a teacher results in resistance" (p. 124). This study continues the search for effective staff development activities for adjunct faculty and pinpoints readiness as a key to adjunct faculty response. While it does not address formative assessment practices, the study focuses on motivation as a basis for improved teaching practices among adjunct faculty and opens the door to further investigation. Similarly, Fulton (1999) conducts a qualitative case study of adjunct professors who participate in a semester-long staff development program at Frederick Community College. The target population consists of individuals who participate in the Skilled Scholars Program. The findings include the need for ongoing professional development and both extrinsic and intrinsic reinforcers to involve adjunct faculty. The value of this study is its exploration of the components of the particular program which help contribute to its success. The sharing of ideas among adjunct professors is a key component. Fulton's study continues the search for effective programs that engage adjunct faculty.

Another researcher looks at very specific factors to measure the success of faculty development programs for adjunct faculty. Franklin (1998) measures successful activities by their influence on three specific variables, including adjunct faculty job satisfaction, student evaluations, and administrator evaluations. Twenty adjunct professors at Holmes Community College participate in a model program of faculty development to investigate its impact; both pre and post assessments are made. The study finds that adjunct faculty satisfaction and student evaluations of their instructors are significantly different before and after the program is introduced.

The extent to which faculty development programs at community colleges influence adjunct faculty instructional practice is examined in the present study. Similar to the qualitative studies mentioned above, it looks in depth at a phenomenon in specific settings. Faculty development programs can impact on the introduction of CATs to adjunct professors, as well as their long-range use. An examination of the use of CATs by community college adjunct faculty has to take into account the nature of faculty development opportunities since the goal of creating a learning-centered college is to enhance the learning of everyone, from students to staff and faculty. Becoming learning-centered is a process that requires broad-based involvement, including adjunct faculty participation.

The Learning College Concept and Contextual Research

The ideas that are the foundation of the reform movement parallel those of the community college movement, which has emphasized since its early history the importance of teaching and intentionally creating an environment for learning. In recent years, the writings of Astin, Bok, Boyer, Shulman, Angelo, and Cross have rearticulated concern for student learning. A 1995 article written by Robert Barr and John Tagg further challenges colleges to change from a paradigm of instruction to a paradigm of learning; the authors not only describe a college's mission as producing learning by whatever means are most effective, but they envision the institution itself as a learner, which can contribute in substantial ways to student learning. "A college is an institution that exists to produces learning. This shift changes everything. It is both needed and wanted (para. 1)." Therefore, transformation from an instructional paradigm to a learning paradigm means reexamining and overhauling an institution's learning structures, including the role and reward system, decision making processes, communication channels, feedback mechanisms, facilities, and funding. Structures should serve to liberate, not constrain, an institution; they are a concrete manifestation of abstract principles and bring ideas about a learning-centered institution to life.

However, the need for a changed paradigm is not always universally wanted or welcomed. In fact, faculty can be resentful of the new campaign for learning-centered institutions, claiming that this has always been the focus of their profession and the split between teaching on one hand and learning on the other is a false dichotomy. "They cannot understand what is really new in this national attention to student learning. Certainly, they do not see something as significant as a paradigm shift" (Boggs, 1999, para. 2). While faculty may erroneously perceive the new model as a loss of teacher control or an open door to a lowering of academic standards, Boggs is reassuring in his description of the learning paradigm change as one that is focused on a broad institutional level. It is built upon four basic tenets: Institutional mission is focused on learning rather than instruction, institutional responsibility is accepted for student learning, institutional decisions are guided by concern for student learning, and institutional effectiveness is measured by student outcomes. Therefore, everyone in the institution has a stake in what students have learned, and every decision at all levels of the organization must account for the way in which learning will be improved. Boggs claims that the efforts of faculty members are essential in the transformation to learning-centered institutions; their ideas should impact on governance, strategic planning, the design of new facilities that are supportive of new teaching and learning methods, and the identification of student learning outcomes for courses and programs. Boggs (n.d.) stresses that colleges should attempt to attract faculty and staff committed to student learning: "New employees, including full-and part-time faculty members and even new board members, should be oriented to the learning paradigm" (para. 17).

The learning paradigm, with necessary transformations at both individual and institutional levels, is consolidated in Terry O'Banion's concept of the Learning College, which is guided by six principles:

1. The learning college creates substantive change in individual learners.
2. The learning college engages learners as full partners in the learning process, with learners assuming primary responsibility for their own choices.

> 3. The learning college creates and offers as many options for learning as possible.
>
> 4. The learning college assists learners to form and participate in collaborative learning activities.
>
> 5. The learning college defines the roles of learning facilitators by the needs of the learners.
>
> 6. The learning college and its learning facilitators succeed only when improved and expanded learning can be documented for its learners (O'Banion, 1997, p. 47).

By 1997, the reform movement, strengthened by the learning paradigm, gains in momentum to such an extent that it is now referred to as a learning revolution. To prevent the core ideas of the learning revolution from becoming ideals that are out of touch with reality, O'Banion (2000) offers practical advice and direction for colleges. He describes benchmark activities and questions, which make up a 14-item inventory for learning colleges. Many resemble the six principles outlined above; however, his suggestions for policies, programs, and practices are spelled out in greater detail. For example, O'Banion asks institutions to assess whether or not all staff members have equal access to training and development programs and to what extent the programs reflect practices inherent in the new paradigm of learning for students. He asks whether the conversations at an institution focus on the kinds of learning valued and provided and whether individuals or groups are knowledgeable enough about learning that they can lead these conversations. He also addresses the need to test traditional methods of assessment and documentation of student learning. The key is that learning must be measurable. He also stresses the need for an inventory of the underutilized skills and competencies of faculty and staff that can be applied in a learning-centered college. He specifically calls for the "factoring in" of part-time faculty as a resource to increase and expand student learning.

The theoretical base for the learning college concept has moved to another level with the selection of 12 Vanguard Learning Colleges (VLCs) by the Learning College Project of the League for Innovation in the Community College (*The Learning College Project*, 2002). The VLCs have made a five-year commitment to become increasingly more learning-centered and to provide documentation of the strategies they are using. Often in the spotlight, these colleges are examined routinely as they make changes. McClenney (2001) assembles a dozen key observations during visits as an external evaluator to the VLCs from October 2000 to March 2001. Among them is the observation that there can be a discrepancy between formal language that indicates commitment to the learning college concept and what is happening in actual practice. There is also evidence that new innovations are tested and then disappear too quickly; effective ways to support successful innovations are needed. Also, a barrier may exist between faculty and the learning college concept, as professors believe they have always been learning-centered and find the changed emphasis a form of criticism. In a general evaluation of the progress of VLCs, Wilson (2002) reveals that the organizational culture of the selected colleges is changing, as evidenced by the revision of mission statements and other college documents, the adoption of new hiring practices to ensure that employees be learning-centered, the incorporation of learning-centered principles into the use of information technology, and the application of learning-centered strategies to programs for underprepared students. The most difficult objective to reach appears to be the assessment of student learning outcomes, which may require substantial changes in curriculum and assessment tools.

Research about learning colleges is quite recent because the concept was only recently framed as a "Learning College" by the League for Innovation in the Community College. Little is known about the methods used to create learning-centered colleges or how successfully colleges implement changes and assess outcomes. For this reason, the colleges that are specifically redesigning themselves according to the principles outlined by O'Banion provide a unique opportunity to examine the process of becoming learning-centered.

Robles (1999) looks at California community colleges that have embraced the goal of becoming learning-centered and researches how faculty, staff, and administration are preparing to meet this goal. Robles reviews the mission statements and human resource development plans of 106 community colleges and selects 6 of them for qualitative case studies. The findings are grouped according to Senge's five learning disciplines, which are at the core of learning organizations. Especially relevant to the present study on CATs is Robles' finding that community colleges are excellent incubators for personal mastery; the lack of mechanisms to provide reinforcing feedback proves to be the weakest link for colleges attempting to become learning-centered. Robles recommends that learning-centered colleges consider the learning needs of the organization itself as important as the learning needs of students, make professional development an integral part of institutional planning, develop feedback mechanisms, and build institutions in which all employees are considered learners. The implication is that adjunct faculty must also be engaged in the learning college.

Teahen (2000) similarly investigates the strategies used by leaders in a community college to become more learning-centered and compares those strategies with the premises of organizational learning. Using a combined qualitative and quantitative method of inquiry, including interviews, document review, observations, and a survey, Teahen finds eight major strategies to implement change in her study of Case Community College, which is committed to being a national leader in learning-centeredness. These strategies include collaboration, broad-based engagement, focus, resources, professional development, results orientation, leadership, and trust/respect. The study concludes that becoming a more learning-centered college relies heavily on process and takes considerable time. An empowering, humane environment is an important dimension in becoming learning-centered, and each individual's commitment to learning is critical. Clarity of goals and measures of achievement are also essential. Teahen resolves that the eight aforementioned strategies are closely aligned with the premises of organizational learning. However, Teahen writes, "Although organizational learning is dependent upon individual learning, individual learning does not always contribute to organizational learning or performance improvements" (p. 10). This statement suggests that in the present study on CATs, professors may learn effectively through the use of formative assessment, but the link to institutional learning may be tenuous.

The disparity between theory and practice in learning colleges is the subject of a study at the Community College of Denver and Palomar College, both of which identify themselves as striving to become learning-centered. Wilson (1999) uses a qualitative methodology to reveal whether or not learning college scholarship, which has focused on institutions as a whole, has resulted in changes in faculty roles, methods, and activities. Theorists are selected on the basis of their contributions to scholarship on learning-centered institutions, and faculty practitioners are identified in the study on the basis of their acceptance or rejection of learning college ideas. The findings of the study indicate differences between theorist and practitioner perceptions of learning colleges, and faculty are in a period of transition

Like most transitions, the changes in community colleges sparked by the learning revolution need time for implementation, absorption, testing, and redesign. As learning colleges take "inventory" of what works and what does not effectively result in improved student learning, the knowledge base increases. What is known about student learning, however, is rooted in the context of a given situation. Cross (1998b) questions traditional methodology for understanding student learning, from the authoritarian search for one right answer or truth, to the egalitarian notion that all ideas are equally valuable and valid. Instead, Cross suggests that an understanding of student learning requires the evaluation of truth in terms of the context in which it occurs. This requires a mix of ideas from both "outside" educational researchers and "inside" classroom instructors in order to gain a deeper understanding about what students are learning and how they are learning it. Cross writes, "Learning is about individuals, and improving learning is about understanding what goes on in the mind of the learner. . . . If you want to know how students learn, find out what makes them tick. . . . Every student who writes a paper, takes a test, asks a question, participates in a student activity as leader or follower, or who comes to our office hours for conversation or help has a lesson to teach us about how students learn" (para. 54). What is known about student learning is founded on instructor observations in everyday classroom situations, which will confirm or challenge accepted generalities.

The importance of context to an understanding of student learning extends to the institutional level as well. Community colleges that profess to be learning-centered should examine their own students within the context of their individual institutions as measures of effectiveness. Contextual research takes into account the uniqueness of each institution and addresses the learning needs of the students enrolled. Learning colleges learn by the efforts of individual professors, including adjunct faculty, who find out what makes their students "tick," conduct classroom research, contribute to public dialogue on teaching and learning, and build upon the scholarship of teaching. All professors assume a leadership role in the restructuring of teaching and learning.

Summary of Literature Review

This study investigates the use of Classroom Assessment Techniques by community college adjunct faculty. The literature review shows that utilization may be affected by a growing resentment toward the working conditions of adjunct faculty. This may prove to be a barrier. A description of CATs and a survey of past studies indicate that the effectiveness of CATs in helping professors assess student learning is based on immediate feedback. The value of CATs as a direct source of communication between teachers and students may facilitate their use. The reform movement, assessment for improvement, and the emerging scholarship of teaching suggest the potential contribution of all faculty, including adjunct professors. The literature reveals that professors can use classroom assessment and classroom research both to assess their own strengths and weaknesses and to contribute to a growing body of shared scholarship on teaching, but adjunct faculty participation in any of these processes has been overlooked. Also included is a review of studies of faculty development programs at community colleges and adjunct faculty participation in them. Faculty development programs may have a strong impact on adjunct faculty responses to CATs. This chapter closes with an overview of the learning college concept and contextual research of student learning.

In Chapter Three, the methodology for obtaining data is described.

CHAPTER THREE

METHODOLOGY

Design of the Study

A qualitative methodology is selected as the most appropriate means of investigating the use of Classroom Assessment Techniques (CATs) by community college adjunct faculty. A phenomenological approach helps to describe the subjective experiences of adjunct faculty as they use CATs and to reveal the meaning that the phenomenon, the lived experience of using of CATs, has for them. This study portrays the human side of the story as adjunct professors use CATs and may disclose the barriers and facilitators that influence adjunct faculty use of a formative assessment method that closely examines the link between teaching and learning in the classroom. The study also looks at the extent to which CATs generate public dialogue on teaching and learning, the role that faculty development programs play, and the ability of CATs to strengthen learning-centered institutions. The value of this research is hinted at previously in Schwarze's (1996) quantitative study, which uses the Angelo/Cross Teaching Goals Inventory to compare full-time and adjunct faculty. Schwarze recommends that "qualitative research techniques might yield interesting results, especially regarding faculty receptiveness to implementing Classroom Assessment Techniques in their teaching" (p. 32).

This study utilizes interviewing as the primary method of data collection. A degree of flexibility lets the complex nature of the phenomenon unfold so adjunct faculty use of CATs can be explored in full. The in-depth interviews are supplemented by insights drawn from researcher field notes, information provided by demographic profile sheets, and new understanding based on detailed review of actual CATs used by adjunct faculty participants.

Project Study

A project study conducted by the researcher during the spring semester of 2002 investigated responses to CATs by adjunct faculty members at two Florida community colleges. The participants included 1 faculty development administrator and 2 adjunct professors at each site. The study proposed four research questions: What are the barriers that inhibit community college adjunct faculty use of CATs and how are they overcome? What are the facilitators that encourage use of CATs? What effect, if any, does institutional type have on the use of CATs by community college adjunct faculty? What evidence is there, if any, that CATs motivate community college adjunct faculty to move from a private investigation of student learning to a public discourse on teaching and learning and add to the scholarship of teaching?

The conclusions of this study answered the four research questions and suggested that the greatest barrier to the use of CATs among community college adjunct faculty was the feeling of vulnerability. Another barrier to the use of CATs was the emphasis on technology in many faculty development programs, creating a tension between "high tech versus high touch activities," with the former often overshadowing CATs. Time constraints also inhibited adjunct faculty use of CATs. Although recent literature gives voice to the resentment building among adjunct professors, working conditions did not prove to be a barrier to the use of CATs among community college adjunct faculty.

Personal motivation and the desire to improve teaching effectiveness were key facilitators, far outweighing institutional support. Convenience and the distribution of ready-made CATs were also strong facilitators. Introduction to CATs through faculty development was the way to "plant the seeds" and facilitated use of CATs. Professors who found the techniques valuable began to creatively "adapt" them over time, as well as use them at institutions where CATs were not promoted. Therefore, CATs became a part of an individual professor's repertoire of teaching strategies and were used regardless of institutional support. The research did reveal that college policies were revised with new incoming administrations, often altering the course of learning colleges; the result was that activities such as CATs gained or lost emphasis. Finally, there was little evidence that CATs motivated community college adjunct faculty to move from a "private" investigation of student learning to a "public" discourse on teaching and learning. Although adjunct professors felt that CATs had the potential to increase the body of knowledge on effective teaching, occasions for sharing were limited by the short stretches of time adjunct professors spent on campus.

The conclusions of the project study helped to shape the current study, indicating the need for an expansion in the number of sites and participants; a broader study could highlight ways to overcome barriers and facilitate the use of CATs, as well as further explore the impasse between the private nature of CATs and public dialogue on teaching. One of the basic research questions was rewritten to focus on faculty development activities. In the project study, adjunct professors were more aware of the programs which directly affected them rather than institutional type. A fifth research question was added to reveal the effect of a Vanguard versus non-Vanguard college on adjunct faculty practice. The interview guides were revised and streamlined with questions that sensitively address the meaning that the use of CATs has for adjunct faculty.

Description of Sites

This study was conducted at 3 of Florida's 28 community colleges, including Valencia Community College, Broward Community College, and Palm Beach Community College. These colleges were selected because they are homogeneous institutions in that they are in the same geographic region, are multi-campus colleges, and have approximately the same size student enrollment. They were also chosen for the distinctive reputations that they have earned and their mission statements that reflect subtle differences within well-defined institutional goals. The choice of the three sites contrasted a Vanguard Learning College with two non-Vanguard community colleges.

Valencia Community College is one of the Vanguard Learning Colleges. Founded in 1967, Valencia Community College serves the students in Orange and Osceola Counties at four campuses and two centers (http://www.valenciacc.edu). The college envisions itself as "an extraordinary learning community," which is outcome-oriented and provides quality learning opportunities in which the student comes first. According to a statement on its Web site, Valencia values each learner by promoting personal success, high academic standards, civic and personal responsibility, and a love of learning; the college also envisions each member of the faculty and staff as a learning leader and provides ongoing personal and professional development of learning leaders throughout the college community. The word "learning" infuses all written and online documents as the college recognizes "the potential of each person to learn." The mission at Valencia Community College is to provide outcomes-oriented, quality learning opportunities by the following: (a) achieving, measuring, and applying the results of learning; (b) emphasizing critical and creative thinking, effective communication, collaboration, and workplace skills; (c) maintaining an open-minded, nurturing, and collaborative environment; (d) reaching out to potential students and providing affordable, accessible learning opportunities; (e) fostering enthusiasm for lifelong learning; (f) motivating learners to define and achieve their goals; (g) respecting uniqueness and appreciating diversity; (h) encouraging faculty and staff to continue professional growth; and (i) partnering with businesses, industries, public agencies, civic groups, and educational institutions that support learning and promote the economic development of Central Florida (Valencia Community College Who We Are, n.d.). Valencia Community College employs approximately 375 full-time professors and 650 adjunct professors.

Broward Community College, founded in 1960, is the principal provider of undergraduate higher education for the residents of Broward County; it now includes three campuses and five centers (http://www.broward.edu). The mission of Broward Community College is "to provide high quality educational programs and services that are affordable and accessible to a diverse community of learners. Supported by the Board of Trustees and the community, a dedicated faculty and staff fulfill this mission through their commitment to student achievement, lifelong learning, academic excellence and the use of current technology" (Broward Community College Mission Statement, n.d.) Broward Community College employs approximately 350 full-time professors and 800 adjunct professors.

Palm Beach Community College, founded in 1933, presently includes four campuses and one center (http://www.pbcc.edu). The college's mission is "to provide accessible and affordable education through a dedicated and knowledgeable faculty and staff, a responsive curriculum and a strong community partnership, which together will enable students to think critically, demonstrate leadership, develop ethical standards and compete effectively in the global workplace" (Palm Beach Community College Mission, n.d.). Palm Beach Community College employs approximately 225 full-time professors and 1175 adjunct professors.

All three colleges voluntarily undergo an accreditation review process by the Commission on Colleges of the Southern Association of Colleges and Schools (SACS), which is the regional body for the accreditation of higher education institutions awarding associate, baccalaureate, master's, or doctoral degrees in 11 southern states and Latin America. The accrediting standards used by the Commission are contained in the handbook, *Criteria for Accreditation*. "Accreditation of an institution by the Commission on Colleges signifies the institution has a purpose appropriate to higher education and has resources, programs, and services sufficient to accomplish that purpose on a continuing basis. Accreditation evaluates whether an institution maintains clearly specified educational objectives that are consistent with its mission and appropriate to the degrees it offers and whether it is successful in achieving its stated objectives" (*Principles of Accreditation*, 2001, p. 1). The accreditation process also addresses institutional effectiveness, which requires identification of expected outcomes for educational and support programs, assessment of whether or not these outcomes have been achieved, and evidence of improvement based on analysis of those results. This is consistent with a key feature of learning-centered colleges—the documentation of learning outcomes.

Central to the process is the self-study, which requires each institution to review its purposes, programs, and services. Administrators, trustees, faculty, staff, students, and others report findings and offer advice. Following the self-study, the Commission on Colleges sends a visiting committee to examine data, conduct interviews, and draft reports. An oral summary of the exit report is presented on the last day of the visit. The report and responses of the institution are submitted to the Commission's Committee on Criteria and Reports and the Executive Council; the Commission on Colleges makes the final decision (*Principles of Accreditation*, 2001).

Adjunct faculty are not specifically addressed in the documents that describe SACS philosophy and the review process. However, in the section of the SACs handbook titled "Core Requirements," participating institutions are reminded that the number of full-time faculty members should be adequate to support the mission of the institution. Under the section titled "Comprehensive Standards," it is a requirement that an institution employ competent faculty members qualified to accomplish its mission and goals. Primary consideration in determining acceptable qualifications of faculty is given to the highest earned degree in the discipline. The institution should also consider competence, related work experiences, honors, continuous documented excellence in teaching, or other demonstrated competencies and achievements that contribute to effective teaching and student learning outcomes. "For all cases, the institution is responsible for justifying and documenting the qualifications of all its faculty" (*Principles of Accreditation*, 2001, p. 13). To meet comprehensive standards, the institution must also provide evidence of ongoing professional development of faculty as teachers, scholars, and practitioners (*Principles of Accreditation*, 2001).

Participant Selection

This study required the participation of 1 faculty development administrator and 5 adjunct professors from each college, for a total of 18 participants. According to Marshall and Rossman's (1999) typology, the sampling strategy was purposeful. To better understand the availability of opportunities for adjunct professors, the faculty development administrator directly responsible for improving adjunct faculty instruction was interviewed first at each college. At the conclusion of the interview, this administrator was asked for the names of potential adjunct faculty participants who were professors in the Associate of Arts Program and may have had knowledge about CATs. To avoid selection bias, and to ensure diversity, the researcher also contacted other administrators, department heads, or faculty members for recommendations. Therefore, there were both formal and informal "gatekeepers." These gatekeepers helped the researcher locate potential adjunct faculty participants.

After adjunct professors volunteered to participate in the study, the researcher selected, from this pool, a group of individuals who represented a broad spectrum of disciplines and a variety of fields of study. In addition, the adjunct faculty participants had to meet the following two criteria. First, the adjunct faculty participants were required to have one or more years of teaching experience at the community college where the interview was taking place. Adjustment to a new teaching position may be an overriding reason for delaying use of CATs. Second, the adjunct faculty participants were professors who had been introduced to CATs at some time in their career and had some familiarity with them. This study looked at positive and negative responses to a phenomenon based on knowledge of that phenomenon.

To ensure confidentiality, the names of all selected participants were replaced by two initials in the findings chapters. The first initial referred to the individual participant; the letter "A" was used to designate the faculty development administrator. The letters "B" through "F" were used to designate adjunct professors. The second initial referred to the college where they taught; the letter "V" was used for Valencia, "B" for Broward Community College, and "P" for Palm Beach Community College.

The following pairs of initials resulted:

AV, BV, CV, DV, EV, and FV—Valencia Community College
AB, BB, CB, DB, EB, and FB—Broward Community College
AP, BP, CP, DP, EP, and FP—Palm Beach Community College

Summary of Information on Adjunct Faculty Participants

	Race/Gender	# of adjunct faculty teaching 1-4 yrs at this college	# of adjunct faculty teaching 5-9 yrs at this college	# of adjunct faculty teaching 10+ yrs at this college	# of adjunct faculty with 20+ yrs of teaching experience (K-12 and/or college)	Degrees	Courses	# of adjunct faculty teaching at 2 or more colleges	# of adjunct faculty actively seeking full-time teaching	# of adjunct faculty who do not want to teach full-time
Valencia Community College	1wm/4wf	2	2	1	1	3 MA 1 MEd 1 Graduate Certificate in Teaching ASL	American Sign Language (ASL) Education English Psychology	1	1	1
Broward Community College	2wm/3wf	1	2	2	2	2 MA 1 MST 1 MDiv 1 PhD	Biology English Math Religion Spanish	1	1	3
Palm Beach Community College	1wm/4wf	2	3	0	4	3 MA 1 MEd 1 MFA	Anthropology Art History Business Math Sociology Studio Art	0	2	2

Research Questions

- What are the barriers that inhibit community college adjunct faculty use of CATs and how are they overcome?
- What are the facilitators that encourage community college adjunct faculty use of CATs?
- What evidence is there, if any, that CATs motivate community college adjunct faculty to move from a "private" investigation of student learning to a "public" dialogue on teaching and learning and add to the scholarship of teaching?
- What effect, if any, do faculty development programs have on community college adjunct faculty use of CATs?
- What are the differences, if any, between the effects of Vanguard and non-Vanguard colleges on community college adjunct faculty use of CATs?

Data Collection

Interviewing was the primary method of data collection, supplemented by researcher field notes, demographic profile sheets, and document analysis of actual CATs used by adjunct faculty participants. These were the sole documents reviewed in the study. Interviews were conducted to explore what it means to be an adjunct professor using CATs in the classroom and to describe lived experiences with the phenomenon of CATs Bogdan and Biklen (1998) maintain that interviewing, whether alone or in combination with other strategies is used "to gather descriptive data in the subjects' own words so that the researcher can develop insights on how subjects interpret some piece of the world" (p. 94).

Via telephone, the researcher first contacted the administrator who must approve research at each college. The researcher explained the study to be conducted and requested a letter of approval (see Appendix A). The researcher informed these individuals about the confidentiality to be promised to each college and to each of the study's participants.

The researcher contacted all potential participants by phone or e-mail; they were asked whether they would consent to being interviewed for doctoral research concerning community college adjunct faculty use of CATs. Adjunct faculty participants were also asked whether they met the two aforementioned criteria.

Interviews were conducted in a setting at the college that was conducive to private conversation without interruption. The interview process began by explaining the general nature of the research, including the methodology employed. Participants were assured that their names would not be used in reported findings. The consent form was discussed and signed (see Appendix B). Every interview was audio taped. Transcriptions were completed by the researcher, bringing her closer to the data and starting the analysis process. This ensured that the researcher was the only person to have access to the data and the identities of the participants. Field notes were written after each interview. The audiotapes, field notes, and demographic profile sheets were stored in a locked filing cabinet in the researcher's home and will remain there for a period of one year after the conclusion of the study; at that time the researcher will dispose of them. Analyzed documents, the CATs, will be returned to the adjunct faculty participants who shared them.

Each faculty development administrator was interviewed once for approximately 2 hours. Although an interview guide was used (see Appendix C), the questioning was conversational and semi-structured, allowing for spontaneous questions and answers. The interview focused on the nature of instructional resources available to adjunct faculty at this college, the extent to which CATs were introduced to adjunct professors, the importance of institutional support of CATs, and ways to make CATs more useful tools.

Each adjunct professor was interviewed on two occasions with a two-week interval between interviews to allow time for reflection. The length of each interview was approximately 1 hour in duration. Although interview guides were used at each session (see Appendix D), the questioning was also flexible to uncover the meaning that the phenomenon, the lived experience of using of CATs, had for each professor. While the first interview focused on past experiences, the second interview looked more closely at an actual experience with a CAT, plus professor reflections on future use of CATs and the role of CATs in generating public dialogue on teaching and learning and adding to the scholarship of teaching. The participants had the option of bringing examples of CATs they have used in the past to the second interview. These were personal, not official, documents that had meaning for instructors. The participants' perspectives on the documents provided additional data

To extend what was learned during the interviews, demographic profile sheets were used. As an additional method of data collection, they consisted of questionnaires to be filled out after the interviews by faculty development administrator participants (see Appendix E) and adjunct faculty participants (see Appendix F). Titled "Getting to Know You," the forms asked for background details, such as the names of colleges attended and degrees earned. The purpose of demographic profile sheets was to avoid using valuable interview time on information that was best obtained in writing. Another purpose was to provide an opportunity for further reflection on topics covered in the interviews. The form was returned to the researcher in a stamped, addressed envelope.

The last method of data collection was analyzing specific documents, the CATs that adjunct faculty participants could electively bring to the second interview as a source of reflection and interpretation. These CATs were the sole documents reviewed in the study. This process was a valuable supplement to the interviews because it was "an unobtrusive method, rich in portraying the values and beliefs of participants in the setting (Marshall & Rossman, 1999, p. 116). The analyzed CATs served a new purpose as the researcher looked objectively at them to support or refute information gathered through interviews. CATs were examined as springboards for the construction of meaning by the adjunct professors who used them.

Data Analysis

Inductive Analysis and Synthesis

The analysis strategy used for this study was inductive analysis and synthesis. According to Patton (2002), "the skilled analyst is able to get out of the way of the data to let the data tell their own story" (p. 457). The analytic process involves immersion in the details and specifics of the data to discover interrelationships and themes; it begins with exploration of the data for consistencies and then confirmation of those consistencies. This strategy is guided by analytical principles rather than rules and ends with creative synthesis. The researcher is required to think both creatively and critically. "The creative mind generates new possibilities; the critical mind analyzes those possibilities looking for inadequacies and imperfections" (Patton, 2002, p. 513).

The data were generally organized according to two analytical framework approaches: responses to questions and illumination of key issues (Patton, 2002). Since a semi-structured interviewing format was used, including an interview guide, the analysis of the data was directed and led by the questioning. Analysis was also guided by key issues that emerged from a review of the literature that related to this study.

The specific steps followed in the process of analysis were the following:

Step 1: Creating Codes

Data analysis was done simultaneously with the data collection process. As fieldwork was underway, the researcher created a "start list" of codes that served as the groundwork for future analysis. At the same time, the researcher kept an open mind for other codes that continued to emerge during the data collection process.

Step 2: Writing Content Summaries

Each of the interview tapes was transcribed immediately, joined with field notes, and written up in a condensed content summary. The summary included some of the responses of the participant to formal (the interview guides) as well as informal elements, or any other related issues that surfaced during the interview. There were a total of 6 contact summaries per college, and a total of 18 contact summaries at the close of the entire process (3 faculty development administrator participants and 15 adjunct faculty participants).

Step 3: Pattern Coding

Information suggested significant pattern codes; some carried over from the "start list," and others emerged later in the data collection process. Some were a product of the content summaries and insight by participants during member checking. Multiple copies were made of every transcribed interview. Blocks of text were then cut and pasted under each of the pattern codes listed on a large display board.

Step 4: Member Checking

The researcher presented each participant with a copy of his or her content summary via traditional mail or e-mail. The participant confirmed the content of the summary or added and deleted sections. This helped to validate the trustworthiness of the data previously collected. The participants were informed of the pattern codes that emerged during the study. Their comments and reaction were solicited, and their insights helped to finalize the process of pattern coding.

Step 5: Interpreting Themes

Information in the pattern codes was further organized into meaningful themes. The researcher moved to a more conceptual level where the data and pattern codes, generated by the researcher and checked by participant feedback, began to form a more integrated understanding of the phenomenon under study. In order to interpret themes, the coded patterns were displayed in two ways: (a) as a matrix grid with participants on one axis and the emerging themes on the other; and (b) as a linear flowchart that began in the location of the classroom and expanded outwardly to encompass the scholarship of teaching. The items on the flowchart moved from a micro to a macro level. The themes that emerged met Patton's (2002) two criteria: internal homogeneity (the codes dovetail or hold together) and external heterogeneity (the differences between the themes are bold and clear).

Interpretation brought the analysis to a higher level as the researcher looked for meaning. While the matrix and flowchart supplied "generic approaches" to qualitative analysis, a philosophical perspective informed the study by "making sense of the world" (Patton, 2002, p. 482). In this study, a phenomenological approach identified and described the subjective experiences of the participants.

Following the interpretation of themes, the writing of the findings, conclusions, and recommendations began. As the study drew to a close, the researcher contacted the presidents of all three participating community colleges to discuss the findings and elicit their responses (see Appendix G); this added a leadership and administrative perspective on the results of the study.

Credibility and Reliability

The credibility of qualitative inquiry, according to Patton (2002), depends on three interrelated elements: rigorous methods that pay great attention to data collection that is conducted systematically, ethically, and according to professional standards; the background, track record, and "presentation" of the researcher; and a basic belief in the value of qualitative inquiry. Interviews with 18 individuals at three sites strengthen the findings and conclusions of the study; credibility results from repeated interviews with the same individuals to look for consistency in the meaning that each instructor created while using CATs and to find common threads across many of the interviews. Merriam (1998) says that reliability "is based on the assumption that there is a single reality and that studying it repeatedly will yield the same results" (p. 205), but qualitative research "is not conducted so that the laws of human behavior can be isolated. Rather, researchers seek to describe and explain the world as those in the world experience it" (p. 205). The reliability of this study is evident in the patterns that emerged from those descriptions; many of those patterns may surface in similar studies of adjunct faculty at other community colleges.

Trustworthiness

The study looks at a particular phenomenon, the use of Classroom Assessment Techniques, by selected adjunct faculty working at three Florida community colleges. The purpose is to look in depth at particular individuals in specific situations and not determine what is generally true of a majority of adjunct professors in a large number of community colleges. Generalizability, therefore, is limited, but the application of what has been learned from the study is not limited. The door is open for adjunct faculty,

faculty development administrators, and community college leaders to compare what has been learned here with their own situations.

The study is not an attempt to prove causality. Instead, it is an attempt to assess causality by examining the network of events, processes, and responses in specific situations. Secure predictions cannot be made on the basis of what has been learned. The study looks closely at the complex web of behaviors that were a response to conditions that may also exist in other places. Stake (1995) believes that the qualitative researcher should do a good job at "particularization" before looking for patterns and making generalizations. He writes, "The function of research is not necessarily to map and conquer the world but to sophisticate the beholding of it " (p. 43). Yet, the nature and limits of knowledge (epistemology) of qualitative research are often both existential (remaining non-deterministic and flowing through a wide range of experiences) and constructivist (relating those experiences to each other and building understanding).

This duality holds true for this study; it is both non-interventionist, as the researcher listened carefully to the full variety of participant experiences, and interpretive, as the researcher looked for themes generated by the data itself. It is a study that looks in-depth at individual use of CATS to both describe and understand their value to adjunct professors, and it also builds connections between these experiences. Since the number of participants was limited, the interpreted themes are not necessarily applicable to a larger group. Since this qualitative inquiry was not undertaken in order to build a predictive model, but rather to study a phenomenon in depth, the inability to generalize based on this study is not disappointing and unexpected. However, it may still be possible, and this may be supported by further research, that the findings in this study are applicable to a more general population of adjunct faculty.

Trustworthiness (validity) is truthfulness of the study, judging the merit of the claims or conclusions as they relate to the purpose of the study. Miles and Huberman (1994) stipulate that the findings must be an authentic portrait of what is studied. According to Creswell and Miller (2000) nine specific validating procedures are governed by the "lenses" or viewpoints of the researcher, participants, and those who review the research. They are also governed by the study's basic paradigm as it fits into the historical trends within qualitative inquiry. Based on the nine validating procedures, this study establishes truthfulness in several ways. Researcher reflexivity required ongoing self-disclosure and recognition of biases and assumptions. The data were continually searched for disconfirming evidence and new perspectives, counteracting the tendency to look for confirming evidence only. Member checking brought data and interpretations back to the participants for confirmation. Auditing by outsiders required a review of the research activities by individuals external to the project. Peer debriefing involved challenges to the research by individuals who asked hard, probing questions because they were familiar with the phenomenon under study. Truthfulness was also established by the dense, detailed accounts typical of qualitative inquiry, which described experiences in depth rather than simply reporting the facts; and by triangulation or the use of several methods of data collection, including interviews, researcher field notes, demographic profile sheets, and document analysis.

My Role as the Researcher

As a qualitative researcher, I looked at the meaning that a specific phenomenon, the experience of using CATs, had for adjunct professors. In-depth interviews, supplemented by researcher field notes, demographic profile sheets, and document analysis, helped me to study the use of CATs by community college adjunct faculty and move in the direction of analyzing and interpreting the data. I did not expect to be able to generalize or theorize a simple, unified explanation in conclusion. I was only able to suggest "multiple plausible interpretations" rather than a "premature and abstract discussion of theory" (Wolcott, 2001, p. 76). To jump quickly to a theoretical level, I would have lost openness to the data itself, weeding out or ignoring inconsistencies in the hope of arriving at an abstract truth. Wolcott (2001) points out that this turnaround makes the researcher feel indebted to theory, instead of letting theory work for the researcher. I did not search for one cogent theory that could tie all of the data together. What I proposed to do is to study a phenomenon directly and see it through the eyes of community college adjunct faculty.

My interest in this topic is the product of many years of teaching as an adjunct professor at a community college. One of my greatest concerns has been the extent to which my teaching impacts on student learning, particularly among a diverse mix of students. I have successfully used CATs for several years to understand the individuals I have in front of me during any one class period, during any one semester. CATs mirror the way I have effectively, or ineffectively, communicated. Through an investigation of adjunct faculty use of CATs, it is my intention to include adjunct professors in the dialogue on teaching and learning in higher education. I hope to contribute to the knowledge base on teaching effectiveness and give the role of adjunct faculty teaching at community colleges the merit it deserves. Part-time faculty members have a valuable contribution to make to the scholarship of teaching and to learning colleges; adjunct faculty and full-time faculty stand on common ground when student learning comes first.

Chapters Four, Five, Six and Seven reveal the findings of the study.

CHAPTER FOUR

ENCOUNTERING THE TASK

The Findings of the Study

The data collected in this study revealed that community college adjunct faculty use of Classroom Assessment Techniques can be clustered into three major themes or layers of meaningful encounters that build upon each other. "Meaningful," within the context of this study, therefore, refers to a deep absorption of information and integration of information into a thoughtful and deliberate decision making process, resulting in personal growth. Thus, overall, the study explored the significance that a specific formative assessment tool had for adjunct faculty.

Many events and interactions can impact and change the course of a professor's life in the classroom; however, this study looked for the ways in which the events and interactions surrounding a phenomenon, the use of CATs, led to a clear and intelligible understanding of what had transpired and the decisions that followed. The study revealed strong evidence of meaningful personal choices and leadership capability in the restructuring of teaching and learning. Three themes emerged from the data analysis; they are presented in the findings Chapters Four, Five, and Six. Chapter Seven expands the last theme and relates it specifically to the learning college. The research questions are answered in the conclusions at the close of each chapter.

The first theme centered on *direct interaction with the assessment techniques themselves—building an understanding of what is meant by the term CATs, extending institutional commitment to CATs, undertaking CATs, designing CATs, and linking CATs with end-of-term student evaluations.* The second theme centered on *the impact of CATs on the professor individually—taking a risk with CATs, disentangling CATs from the instructional paradigm, recognizing oneself as researcher through CATs, linking CATs with a dedication to teaching, and improving teaching effectiveness through CATs.* The third theme centered on *the connections that CATs fostered with others—building relationships with students, faculty, and administrators; it also concentrated on reaching out through faculty development activities and strengthening a learning-centered college.*

Thus the three themes start with encountering the task or the CATs, progress to encountering oneself and encountering others and, finally, connect encountering others to the learning college. This progression is almost an organic approach to the use of CATs. First, a person must become familiar with CATs, then overcome personal trepidation to using them, and lastly link them back to specific classroom settings and then, through sharing, to a broader scholarship of teaching and learning.

The findings in this study, based on the three areas of meaningful encounters, answered the five research questions:

- What are the barriers that inhibit community college adjunct faculty use of CATs and how are they overcome?
- What are the facilitators that encourage community college adjunct faculty use of CATs?

- What evidence is there, if any, that CATs motivate community college adjunct faculty to move from a "private" investigation of student learning to a "public" dialogue on teaching and learning and add to the scholarship of teaching?
- What effect, if any, do faculty development programs have on community college adjunct faculty use of CATs?
- What are the differences, if any, between the effects of Vanguard and non-Vanguard colleges on community college adjunct faculty use of CATs?

Overview of Encountering the Task

A fundamental area of discussion with adjunct faculty participants and faculty development administrator participants was both the nature of formative assessment generally and characteristics of Classroom Assessment Techniques specifically. A strong emerging theme was the concrete nature of CATs as a learning and communication tool. Yet, the techniques they described varied in many ways—in their association with Angelo and Cross, in their respective college's familiarity with CATs, in the mechanics of using CATs, in their creative experimentation with CATs, and in their perceptions of the impact of CATs on end-of-term evaluations by students.

Building an Understanding of the Term "CATs"

All of the participants in the study shared an understanding of formative in contrast with summative assessment and found both to be valuable and interrelated. Long before Angelo and Cross had consolidated suggestions for CATs in their 1988 and

1993 handbooks, many of the adjunct faculty participants had already experimented with simple questionnaires consisting of a question or two, quickly distributed and collected during the same class period to obtain feedback from students. CATs, therefore, were often thought of in more "generic" terms to those individuals who had been acquainted with formative assessment for many years. One professor pointed out that Angelo and Cross had done a thorough job on "something that had been around for a long time. It must have been an enormous effort on their part, but getting students to put their thoughts about a class or an assignment into writing wasn't new. A lot of teachers already did this type of thing—in a natural kind of way. I don't think it was an original idea, but they saw it as something not just important—but essential."

Adjunct faculty participants who were introduced fairly recently to CATs in a faculty development program, for example Valencia Community College's *Destinations*, closely associated CATs with Angelo and Cross. EV, an adjunct professor teaching two courses this semester in American Sign Language, described her experience:

> I took Valencia's course for new teachers, two classes and the rest is on-line, and I also took Destinations 2001 one summer with about 75 people. Half were adjuncts like me. I still use the Angelo and Cross assessments that help my students to see themselves as learners—the One-Minute Paper more often. . . . So I use CATs for two things, to tell them about what they need to do and to tell me what I need to do. I teach a hard subject, but people take sign language thinking it will be easier than French or Spanish. It's as hard as Chinese, I think. Sign language is a three-dimensional language and they need to practice over and over. CATs help them see the relationship of their study habits, their study skills, and how successful they're going to be in here.

Several adjunct faculty participants at all three colleges were familiar with specific, well-known CATs—the One-Minute Paper and the Muddiest Point—but had never seen the actual handbook of 50 CATs written by Angelo and Cross. In fact, during the interviews, they were eager to flip through the pages of the more recent edition of *Classroom Assessment Techniques*, which the researcher brought with her.

Adjunct faculty participants already familiar with the handbook seemed somewhat overwhelmed by the amount of information on each CAT, including description, purpose, teaching goals, examples, suggestions for adaptation, pluses and minuses of use, and warnings. BV said, "I was given the book by the college, but it's more like a big encyclopedia than a guide. Honestly, I don't have the time to go through it." FV commented, "The book is another big project that I never seem to have time to get around to. It's here as a reference, but I use the CATs that I hear about. Most people talk about the Muddiest Point." During one interview, the researcher noticed two copies of *Classroom Assessment Techniques: A Handbook for College Teachers* side by side on a shelf in the adjunct faculty resource room at Valencia Community College's West Campus; both looked new and in perfect condition. CV discussed with the researcher the potential advantage of a short, condensed notebook with one CAT on a page so professors can remove them, copy them, and use them, like a lab book to go along with a textbook. Thus, one book would have all the background and the reasons for using a CAT; the thinner book would have removable CATs for professors to use. CV commented that the Angelo and Cross handbook is so comprehensive that "you have to wade through it. So I don't use any straight out of the book. For a first time instructor, it would be great to be given them and use them like this for awhile, and later take off and adapt them from there. " BP agreed that a "template" of CATs would be very helpful. Several adjunct faculty participants suggested a link on their college Web page to CATs that could be easily downloaded.

Extending Institutional Commitment to CATs

At Broward Community College, CATs "always come up as a best practice" at adjunct faculty orientation or at the informal teaching and learning forums organized by various departments, according to AB, Director of Staff Development.

> When we talk about teaching excellence, this particular instrument (CATs) is always mentioned. Sometimes we don't refer to CATs as Classroom Assessment Techniques because we talk very specifically about the Muddiest Point and the Background Probe—in other words, asking students what they need the most help with. But some faculty refer directly to Angelo and Cross.

At Valencia Community College, Faculty Development Coordinator AV emphasized the importance of CATs in programs for full-time and adjunct faculty.

> It's an active learning technique that we want people to be exposed to no matter when we get a hold of them. It's something you can accomplish in a workshop; people can come back and talk about what's going on. . . . It's an opportunity. Classroom Assessment Techniques are a terrific tool to get someone started, to open them up to the focus on learning; it pushes you away from covering content to how is this being received, what's going on with the students. You're eliciting feedback from the student and providing feedback to the student. It's an entire communication loop.

He also stressed the tie between the "brand names," Angelo and Cross, and CATs to further emphasize the research base for the techniques.

> For three years now we've been buying that book for people in the Destinations program. . . . We'll take time in different workshops to use the book and talk about it. So as far as brand names go, we try to be explicit that Classroom Assessment Techniques have a research base. One of our backbone issues is that what we do in faculty development will be research based and it will be scholarly. And we will engage the faculty member in the same kind of scholarly inquiry into what is being learned here. We want people to feel like they've been engaged in something interesting and that it answers questions they have about their students, instead of being told how to teach or told what to do or being criticized for being ineffective—instead of many of those negative things. It [CATs] is a really good tool. I am very pleased with it.

The Academic Coordinator at Palm Beach Community College discussed her role in a variety of activities that had the potential to impact on adjunct faculty, including coordinating the Honors Program, maintaining faculty Web pages, and planning the fall and spring Development Days. She described the extent to which individual departments and their chairs addressed information on teaching and learning for adjunct faculty and their concerns. Greater decentralization meant that faculty development for adjunct professors was tailored according to more "local" concerns. In reference to CATs, AP commented,

> I have heard of them, but I am not very familiar with them. They are not normally introduced during Development Days, but I can't say whether or not they are formally introduced in the departments; they may be going on within the departments, but I am not familiar with that. . . . It's also possible that people find out about them on their own.

When asked about resources on good teaching practices available at the college, AP discussed the strong commitment to 4MAT, which is a system of instructional design that encourages professors to create programs that engage the four major identifiable learning styles based on the different ways that people perceive and process experiences and information. "We are very involved in it [4MAT]. We did a half hour presentation for full-time faculty just to give them the flavor of it; we have offered break-out sessions at Development Days, which adjuncts can attend. But we're often not reaching them this way." AP's concern for reaching adjunct faculty mirrored comments made by the 2 other administrator participants in the study. "We send out e-mails to all users about those days, but adjuncts may think, 'this doesn't really include me.' For the last Development Days, we sent fliers to everyone, including adjuncts. The adjuncts have mailboxes so we're sure they received them. We thought we could catch them this way, but there are a lot of other reasons why they have difficulty attending our events."

During the interview, AP recognized the connection between CATs and 4MAT.

> I see a strong connection between the way CATs perform and learning styles. . . . There's a growing interest and concern for learning styles, and this is a tool to better understand them. Interest in learning styles is growing—as well as in reaching the students. This is another way to reach the students; this is another way to get that information. This is something that should be introduced at orientation. 4MAT is a much bigger picture, and this is a smaller, but significant, piece of the pie—something like this may not take more than five minutes time.

Despite the differences in the method or degree to which adjunct faculty were formally introduced to CATs, all 3 faculty development administrator participants appreciated their value. This was often linked to an overall commitment to the learning paradigm and a broader network of ideas that have been championed by leaders of the learning revolution, including its most vocal spokesperson, Terry O'Banion. In most instances, visits by educators and writers committed to a shared scholarship of teaching and learning reinforced the broader philosophical foundation of CATs. Two of the participating community colleges were strongly committed to bringing authors, scholars, and researchers to campus. The Director of Staff Development at Broward Community College recalled visits by Angelo and Cross in the 1980s, plus one by O'Banion a few years ago. She described the extent to which the college "reaches out" for nationally known figures, specifically the recent choice of Mark Milliron for a series of workshops, including "Making the Connection to Learners and Learning" scheduled one month after her interview with the researcher.

> I work closely with the Vice President for Academic Affairs to make sure the Teaching and Learning Community (TLC) is running programs. My office takes care of a lot of the background and logistics to get the programs going. I don't

> personally choose the speaker, but someone on the TLC Committee who is out there going to conferences, it could be a faculty member or administrator, someone who is out there listening to presenters and experts in the field, makes a suggestion. They will come back and say, "Let's get this guy Mark Milliron," and then we'll go after him. We make it happen. It's a real joint effort.

Opportunities at Broward Community College also include extensive Computer Workshops and Extended Orientation Workshops for new faculty, for example, Textbooks and Readers: How Can We Bring Them Together? In addition, workshops may be offered as a result of a special request by a department, such as team building workshops or Myers Briggs Type Indicator workshops.

Valencia Community College also reaches out to nationally known authorities to bolster learning opportunities for faculty. Tom Angelo has visited on six occasions; twice he was the Destinations keynote speaker. Destinations is a faculty development opportunity, open to all and particularly appealing to adjunct faculty, carrying with it a $1000 stipend; Destinations 2003 is scheduled for four weeks in May. It involves 20 hours of professional development and a 20-hour individual project focused on the scholarship of teaching and learning. The Faculty Development Coordinator at Valencia saw this as part of the college's ongoing shift to the learning paradigm and the need for conversations on learning.

> What could be more central to what we're doing than to talk about and look at what students are learning? It's an important philosophical shift, not just a semantic one. . . . There are fascinating questions like, How do I know they're learning? or How do I measure the learning, meaningfully? I don't see an end to the paradigm shift, to the emphasis on learning. . . . I like the idea that you have to talk about learning. You don't talk about delivery of instruction like it was bakery goods. You have to talk about learning which is a gerund; it is a verb; it is active; it is something that is ongoing.

Valencia's outreach to its faculty members includes seven additional programs, and adjunct faculty are eligible to participate in most of them. They include Title 3 and Title 5 grants, Start Right Initiative (multiple strategies for satisfying the developmental needs of preparatory students), Faculty to Faculty (a new program consisting of a series of seminars designed to support the growth of a learning community), TVCA Initiative (a program related to Valencia's core competencies for faculty who teach high enrollment classes), Teaching-Learning Academy (seminars, roundtables, and workshops to support faculty seeking tenure), and an on-line faculty development course using Time Revealed Scenarios (TRS), which is a software program that allows faculty to think about problematic classroom situations and share comments with colleagues. Scenarios has been popular with adjunct faculty, carrying with it a $250 stipend, and is repeated every semester. It involves 20 hours of on-line professional development focused on teaching and learning, which the administration playfully promotes with the phrase, "Learn Stuff and Get Paid." AV wrote on his Getting to Know You form, "Faculty developers had been looking for a vehicle that would solve some perennial problems inherent in the traditional face-to-face workshop framework." To meet this need, "Teaching in College, Community College Edition" was developed by WisdomTools, an entrepreneurial offshoot of Indiana University, Bloomington; Houghton Mifflin Company; and faculty developers from Valencia Community College and two other universities. The course begins with a face-to-face orientation, syllabus, assignments with deadlines, discussion threads, and assessments. The on-line portion of the course, Scenarios, contains four basic elements: storyline, characters, resources, and activities.

> What we have is a fictional character who is a newly hired faculty member, and all of the travails of his first semester are played out in four episodes that bring the participants through planning their courses to struggling with the initial meetings with their students and trying to improve their methods of seeing whether the students are learning anything with us. . . . For the community college, reaching out to the adjunct population, which is mobile, is really one of our goals. Our present main character is not an adjunct, but we are thinking of rewriting that in our next version. (AV)

Reflecting a learning-centered philosophy, the activities in Scenarios emphasize active faculty engagement; professors apply what they have learned in their own classrooms and report back to their colleagues on-line. Learning is active, not passive. One of the assignments specifically encourages the use of CATs, and professors engage in an on-line chat room where they discuss their experiences with CATs. In its trial run over one year ago, 39 faculty members enrolled in Scenarios, and 37 were adjunct professors. This year there were 90 participants, and 45 were adjunct professors.

AV described how the asynchronous format of Scenarios has allowed faculty members to participate at their convenience. This has been especially accommodating for adjunct faculty. AV specifically addressed on-line resources, "I'm not sure it's the best method, but it's certainly one that we don't want to ignore." AV continues to work with colleagues and WisdomTools on an on-line course for adjunct faculty that could be accessed by colleges nationwide. At the same time, to maintain a balance between "on-line" and "on-ground" opportunities, AV described the fledgling Faculty to Faculty program, "We simultaneously have another adjunct faculty effort going on, on all four campuses; it happened last year on just one campus as a pilot study. There will be a series of four face-to-face meetings at various times on various topics beginning in the January semester. Each is separate; they are not necessarily sequenced, so you don't have to do one before the other. We're trying to reach as many adjunct faculty as possible."

Palm Beach Community College remains focused on issues close to home. AP wrote on the Getting To Know You form that "PBCC is very flexible and responsive to the community's needs. Decisions are based on what is the best for our students." She also pictured two-year institutions as leaders in the learning revolution, "Community colleges are uniquely positioned to learn about teaching and student learning. We are so flexible; we have more power than the other institutions individually. I feel I have the power to suggest things and have it happen." Concentrating heavily on opportunities in technology, the college offers a broad list of computer workshops open to all on staff. Recently, the Academic Leadership Team at Palm Beach Community College embarked on a new professional development program to meet the challenges of leadership in organizations. Leading for Learners is characterized as a program that concentrates on leading and managing, leading effectively with teams and groups, and meeting the challenges of leadership from both personal and organizational perspectives; this program continues to build awareness, knowledge, trust, and collaboration strategies (M. Ray, personal communication, March 13, 2003).

The participating faculty development administrators at all three participating colleges believed that adjunct faculty would be highly receptive to CATs. Broward's Staff Development Administrator AB commented, "They seem open to new ideas. They can use CATs to find out what works in a classroom and what doesn't. The real challenge, of course, is doing something about it. Adjuncts seem to accept that challenge." She later tied that acceptance to the concept of the learning college:

> With CATs, you have to evaluate yourself, and it's tough to do personal evaluation. There are people who I know quite well who feel that they don't have to improve their techniques or style. Adjuncts are generally more receptive to something like this because they don't necessarily have the academic notion that they are the sage—the wise person who has all the information. They come into the classroom and bring real-life situations to the classroom. They would invite a critique of how they well they do what they do. At a learning college, a teacher isn't a finished product.

Valencia's administrator shared a similar point of view:

> There's a variety of attitudes out there about that, about teachers thinking about themselves as learners just like their students. Some are quite clear that they don't know how to teach and feel anxiety about it and are very happy to have any kind of outreach and support, adjunct faculty and full-time faculty. With full-time I find that we have to be very delicate about how we approach the idea of everyone as a learner. Among veteran faculty it can be perceived as disrespectful to some extent, that it doesn't acknowledge their decades of teaching community college students. It's a dicey conversation sometimes, so I've learned to do more listening than telling, bringing the conversation around to the learning question, not just telling them what to do. I've had some diplomatic training, I guess, through the job here. I do think adjuncts are more receptive.

He also summed up the institutional foundation upon which use of CATs is built. This outlook in general was shard by all 3 faculty development administrator participants, "When we look for evidence of learning, we don't ask, 'Now who can we blame?' Instead, we take a positive approach. We are looking for wellness, not illness."

Undertaking CATs

Adjunct professors from Palm Beach Community College and Broward Community College were not specific about the first time they asked for written feedback from their students. One commented, "It's something I've always done. I don't remember an exact starting date. I use them because it seems like the natural thing to do. I really can't remember not using them." Adjunct faculty participants from Valencia

Community College were more specific since they were formally introduced to CATs as part of adjunct faculty development. One adjunct faculty participant at Broward Community College and 3 adjunct faculty participants at Valencia Community College began using CATs because interest in them was sparked in a faculty development activity. Overall, regardless of the means by which they were introduced to the techniques, adjunct faculty participants adopted them on a long-term basis if they found them genuinely valuable. This value-added to the teaching experience was a strong facilitator to the use of CATs. Several participants mentioned that CATs became an educational practice that they liked to draw upon because it had meaning for them and could help them make instructional choices. CATs were assessment instruments that surpassed others in their sensitivity and immediacy.

> I liked CATs from the start. It's an important way to find out what students are thinking or what they are finding tough. I've found that I can go to plenty of people outside the classroom for advice, but don't forget that it takes a lot of time to explain to outsiders all of the subtleties of a situation, and sometimes they still won't get it. Or, they impose their own take on things, on what you're saying. CATs are the input of those people directly involved, and it seems natural to go to the students themselves. Who is more involved than the students sitting there? (DP)

> I use Classroom Assessment Techniques mostly in my literature and film classes, and I use them midterm when they submit their in-class writing. I give them the short questionnaire to fill out about my teaching and about the course in general. You learn a lot from them [CATs]. When they assess the course verbally it works—but this works better. (FB)

The word "natural" was used many times in reference to CATs, implying that they flow as expected from the classroom dynamic and spring from the need for students and professors to communicate effectively with each other. First time use of CATs was in many instances a response to an uncomfortable classroom situation rather than a conscious decision to try the techniques because they seemed like a good idea. One adjunct faculty participant said, "Working CATs into a class is a lot different than trying out a new lecture idea or a class project. People try CATs because something's not the way you want it. Usually something is missing. You have a concern." While several adjunct faculty participants tried to pinpoint exactly what that "something" was—"a lifeless group," "poor exam grades," "when I ask a question and they look down," "boredom," "they just didn't seem to get what I was saying"—there was never consistent reference to any one trigger. It was generally believed that an adjunct professor instinctively knows when it is the right time to start using CATs.

The adjunct faculty participants called upon CATs to help them with assessments in any one of the three areas into which the techniques are divided in the 1993 Angelo and Cross handbook: (a) course-related knowledge and skills; (b) leaner attitudes, values, and self-awareness; and (c) learner reactions to instruction and the learning environment. FV initially used CATs to get feedback on how well her students were absorbing course-related content.

> I started using the CATs that were standard around the two departments where I work, Student Success and Education—the Muddiest Point was probably the most popular. Students feel I value their feedback. I do think it's very important to let them in on the results of that feedback. I will start the next class by saying that the Muddiest Point in the last class was such and such, and I go over it again in detail. CATs are more than a touchy feely thing. They are genuine classroom road signs.

Similarly, Faculty Development Coordinator AV, who taught an evening government course in addition to his administrative responsibilities, found that CATs also explored the gap between basic knowledge of content and further application of that knowledge.

> Last week I did a simple What's Clear and What's Not Clear. It's another way of getting at the Muddiest Point. It's always from their perspective and the way that they express it is useful to me, too. If they paraphrase the concept inaccurately then I've learned something. The students sometimes have what is called "The Illusion of Knowing"—the student says, "I think I have a grasp of something," but doesn't or can't apply it. You know that phenomenon you may have had in math class when something is clear when the teacher explains it, but you can't use the concepts on your own when you go home. CATs are a good window on that.

Many adjunct faculty participants also spoke of using CATs as a way to find out about their students' self-awareness as learners and strategies for learning, which is the second group of CATs in the handbook. They wanted information on how their students tackled a reading assignment, finished a writing project, or studied for exams. Some had their students keep Study-Time Logs to keep track of the hours spent outside of class on an assignment, making note of those times of day when they are most productive, or they had their students write a Process Analysis of the steps taken to complete an assignment.

Feedback on the learning environment, responses to teaching, and reactions to activities, assignments, materials, and exams—the third group of CATs in the handbook—was another area of investigation. FB revamped the due date of an important writing assignment because of student feedback on a CAT that assessed an assignment.

> I have integrated many of their suggestions on CATs—for example, the research paper is a big deal in 1101 and most teachers leave it for the end of the semester. My students wanted to do more in the middle, so that at Thanksgiving and Christmas time when we're looking forward to finals they're not in the middle of doing a research paper. Wasn't that a good suggestion! Plus, I gave them their topic the first month. That was a while ago. Now I even give my students the topic the first week of school. I'm always changing like that. I take their ideas seriously, and I change things to suit myself, too. I am always reinventing the wheel.

BP said, "I always ask for feedback on the things I bring to class, materials, videos. I have them write a brief reaction to help me assess their value. If the reaction to the material is negative, I just chuck it." Another adjunct faculty participant mentioned how she designed CATs to help keep herself informed of classroom distractions and potentially change the learning environment; she recalled a class that made her uncomfortable and uneasy, a class that did not measure up to her own expectations, so she turned to the students themselves. As she discussed this with the researcher, the participant reflected on the way CATs protected her privacy while giving the problem in her classroom of "too much socializing" some exposure. In the following situation, she asked for suggestions without pointing a finger of blame, basically teaming with the students as problem-solvers.

> They wrote down their suggestions. Nothing they said was a surprise; it was obvious really, but it got rid of that me versus you feeling—they had constructive things to say, and I wasn't at all surprised when they asked me to plan some time or projects when students can mix together because they come here for that, too. I was impressed with how things improved at that point; I was impressed with the kind of feeling that give-and-take feedback can give a class. The tone changed. (EP)

CV found that individual students used CATs as an avenue of expression when a particular situation was not conducive to their learning.

> I once had a student who wrote down he didn't like the group that he was working with. He said it wasn't working for him. He actually signed his name; that was optional. My students know that if there is anything they personally want to discuss with me, then go ahead and put your name down. So I switched his group. I just came back to class and said, "We're going to switch groups around a little bit." He wasn't the only student who moved, so it didn't look like it was driven by him. It seemed teacher driven, not student driven. You can find out some little, carefully kept secret with this [CATs].

Some adjunct faculty participants admitted that they postponed using CATs because they were busy confronting other problems, especially in their first years of teaching, or they simply delayed using them due to time management problems.

Pressures like these initially posed a barrier. The following comment was typical: "Some people will jump right in and use them their first semester. Some will wait. I remember being so overwhelmed my first semesters here that I couldn't even consider something like this. Not that it wouldn't have been a good thing. I guess it just seemed like one more thing to do, and my plate was already pretty full." Similar to other adjunct faculty participants, FP wrote in her Getting To Know You form, "The hardest part of using the CATs is finding classroom time."

While many of the adjunct faculty participants valued CATs as a tool to communicate with students, they found that ease of use and convenience strongly facilitated not only their adoption of CATS, but also their continued use of them. CV said, "I like CATs because they are so easy to use. It doesn't get any easier than this. I get a lot out of them with very little effort on my part." DP thought that CATs actually saved time by informing the instructor of "trouble spots" or content that students were not grasping, "You can zoom into those things that must be reviewed rather than speculate and maybe overlook the real problem areas." AV said, "Faculty can get answers to questions by merely asking. It's revelatory for faculty. It opens up a box, and it's also low pressure. You can use index cards and toss them out. It's not another paper to grade." None of the adjunct faculty participants found that the obstacles to using CATs were the techniques themselves. In fact, they applauded their simplicity. "This is really a simple tool. How long can it take to grasp what needs to go into this?" commented one adjunct professor.

There were conflicting ideas about when and where CATs should be introduced to professors, although everyone thought the techniques valuable enough to be a key piece in the orientation for new adjunct faculty. BV said, "It's too bad so many adjuncts come without any teaching background. CATs should be introduced in a course, maybe part of a master's program if teaching may turn out to be an option . . . part of one course in the basics of college teaching."

Designing CATs

Approaches to designing CATs varied. Some adjunct faculty participants adhered to the same ones every term. DP commented, " I simply ask my students one specific question a few weeks into the semester—How am I doing? or How can the course be improved?" CP asked her students every semester, "How many of you thought this class would be different than it actually is? How is it different?" DV mentioned his "historic midterm questions," which he uses every year for feedback on his exam, "Does this test accurately reflect what we did in class? What could you have done better to prepare? What could your instructor have done better to help you to prepare?"

Most adjunct faculty participants felt at ease designing their own CATs. Being creative was consistent with the motto, "Adapt, don't adopt." Some enjoyed a high degree of flexibility in order to meet the needs of the students in a particular class, and many enjoyed experimenting. This facilitated use of CATs. The researcher found that adjunct faculty participants who taught English or art history classes were more likely to experiment when designing CATs; one adapted the Angelo and Cross One-Sentence Summary and had his students write a one-sentence news alert for CNN that summarized the reading assignment; another adapted the Invented Dialogues and had her students write e-mail messages that two famous artists in history might send to each other if they were alive today. The general consensus was that creativity was in order. DV said,

> I've written my own CATs, keeping it simple with one or two questions. I generally like being creative. I like to rattle ideas around, rework ideas in new and interesting ways, unexpected ways. Some of the CATs in the book ask students to link ideas, and I've just played on that.

Each adjunct faculty participant seemed to find CATs very serviceable in one area of their course. Over time, they customized CATs to meet their own needs and concerns. Most of the adjunct faculty participants tailored their questions to the group in front of them, and this flexible practice was one that became a natural part of each professor's repertoire of activities.

> I use written questionnaires quite often during the semester. I still find it a nice way to break the ice so to speak and also to keep in touch with students' feelings about things. I am careful to limit my questions. It can be related to the content of the class—What was difficult in today's lecture? What was unclear in today's discussion? Or it can be related to the people in the class—Do you feel comfortable or uncomfortable in here and why? I don't plan out too far in advance what I will ask. It's different every semester for me. (FB)

Similarly, FV felt that all of her classes were distinctive in some way so she found it advantageous to ask for feedback from students in order to change lessons or exams. As an adjunct professor teaching four classes (three different courses) in two different departments, she was stretched as an instructor and found that written feedback from students in both Student Success and education courses was one way of keeping track of a complex situation. A common concern—text anxiety—emerged in the classes. In her Early Childhood course the students had difficulty with a particular exam so she asked them to write down how they would like to see the next test formatted, resembling the CAT titled Exam Evaluations by Angelo and Cross. In her Introduction to Education class she started reviewing little "tricks" on how to study for tests. FV described her response to her students' concerns expressed on CATs:

> The big difference between the way I was taught and the way I teach is I ask for feedback from the students. Each class, and this might sound crazy, takes on its own personality. Some things that work with my first class might not work with my second one. So, for example, my Early Childhood class—it's pretty difficult; there's lots of information—and they had difficulty with the first test. So after the exam I asked them how they would like to see the next exam, how they would like to see it formatted, what would they be more comfortable with. In my Intro to Ed class as a group they have a lot of test anxiety so today I'm going to give a really short unit on tricks, really testing techniques, which is not part of the curriculum per se, but I think it would help them overall as students. So I'm doing a short thing on how to study, how to prepare. I'm paying attention to the way they learn. That's what I'm here for. I try to stay open to whatever the students need.

Some adjunct faculty participants relied upon the One Minute Paper and the Muddiest Point from the Angelo and Cross handbook for general feedback; they became more inventive in areas where feedback seemed most critical to them. CV, who appeared to be the most committed to the use of CATs of all the adjunct faculty participants, felt very much at ease adapting both the number and types of CATs to fit the demands of any one class.

> I attended several Destinations programs, and I use some CATs in probably every one of my courses. I rely heavily upon CATs when it comes to preassessment. I often give a preassessment to students, in groups. I want them to look ahead at the challenge facing them in new material. I give them questions, and they'll literally fight over the answer as groups. That Classroom Assessment Technique tells me how much of that material I need to go over, and in what depth. It's rare that I find I can go through that section quicker, very rare. I usually find out how much more I need to go over.

She related her experience in a class earlier that morning, just before the interview with the researcher:

> I used a CAT today, and I was really surprised. I often use a CAT the day before they take a test so I can be sure everyone understands the concepts they are going

> to be tested on. This time it was disappointing. They didn't understand it, and the test is scheduled for the next class. After finding that out today, I know that I can't give them the test on Thursday. I now know they need more reviewing, and I have to straighten out what they don't get about it. CATS help me to find out when they're ready to be tested for a grade.

It was common for adjunct faculty participants to design CATs at the beginning of the semester to assess how much of the content of the course would be completely new to their students. EP used her own variation of the Background Knowledge Probe. "I have them start writing right away so that I can get to know them. I put up a slide of the Venus de Milo and ask them to describe the culture they think this comes from. I get to know how sophisticated they are and how well they write. You can learn a lot from one good question." CV also designed CATs to find out what "they know about an author, what they've already read by that author, what movies they've seen based on the literature that that author has written. I want them to get an awareness of themselves, of what they do and don't know." She later added, "They search their own memory, and then apply that to the piece we do read. College isn't a place to reaffirm what you do know—find out what you don't know and work on that."

Adjunct faculty participants also designed CATs with the intention of gauging learning progress. EP said,

> I'm finding out which activities are really helping them learn. They tell you which activities are valueless. Once I asked students for feedback on what they thought of a group project. I asked them what they learned. They generally said that it was so much fun, but they didn't learn that much that was new. What a revelation that was. I had to completely rethink that project.

In her sign language class, EV alternated among a variety of CATs in order to get feedback on comprehension.

> I've switched around and tried different things. I don't really use the Muddiest Point. I don't use that one as much because I get the same sorts of answers every time I do. They write that they don't remember the vocabulary, which is true, and I already know that. There are other battles I'd rather fight. I'd rather know if they understand what I'm signing, when I'm signing a story. Do you get it? Do you understand what's happening here? I have them do a One-Minute Paper or just a sentence to summarize what it's all about. I want to know if they're getting the receptive skill.

At the same time, EV used CATs for her students to reflect on how well they were learning the material and how they might improve their learning. She used CATs to pinpoint success and to encourage new levels of mastery.

> What I really like about a CAT is I don't have to write down little notes to myself about successes and failures—it lets me see immediately who's having trouble and who's not. And it's all there in writing. But I really use CATs more for students to see themselves. They have three video exams where they have to sign very specific things. They videotape themselves and bring it in and rate themselves based on this rubric. That helps them to know what they're doing well and what they're not doing well. This time around I've added to the rubric some CATS. What are you going to work on next? Now that you've seen this, what do you want to improve? What did you do well? It's important for them to pick out things that they did well. I hate it when all you show students is the negatives. That's no fun.

Sensitivity to student needs resulted in FV's using a variety of assessment methods to arrive at student grades in her education course.

> I take student suggestions seriously. I learned from the feedback they gave me to offer a wide assortment of opportunities—a written philosophy of education, interviews, classroom observations—to give my course greater balance. It can turn out to be a lot of work for the teacher, but these types of things make testing only part of the course, and my students can show their strengths in other ways.

Math adjunct professor FP was also sensitive to her students' self-confidence, addressing Angelo and Cross' concern for learner attitude and self-awareness in CATs she designed on her own, "I start the ball rolling right away. I need to hear from them. I ask them to write down during the first class what was the last math course they took, what was their best experience with math, what was their worst experience with math, how can I help you with math?" FP was well aware of the fears harbored by students who have returned to college after a long hiatus.

> My questions can also be very open ended. I might ask them, fill in the following: I want everyone to know that I . . . Some students stick to math when they answer. They write, "I want everyone to know that I have trouble with percentages or fractions or word problems." Others get more personal. They write, "I want everyone to know that I'm a mother back in school and this class is a real reach for me."

Some of the adjunct faculty participants talked about the relationship between the CATs they design and learning goals set for their students. They believed that CATs should be directed at reaching learning goals and at improving and expanding learning that can be documented, as described in O'Banion's six principles of a learning college. BV said the following of teaching Student Success courses, "I thought if I'm going to teach Student Success then I need to know what the college expects. I need to know what the competencies are and how to meet them. I need to know what the college goals are." Focused on specific learning goals, CB, a math adjunct professor, rarely deviated from feedback that was content related, where both student and instructor judge mastery; he used a department-wide method of formative feedback, instead of teacher-generated CATs, and weighed both the pros and cons of the ALEKS program.

> In math, it's important for students to get feedback on mastery of the material. This takes practice, so we use a computer-assisted technique called ALEKS to help them learn. But I'm getting very mixed reactions. . . . A student enters their answer, and if you don't enter your answer in a direct fashion—you miss one thing—you have to start all over again. . . . You'll work a problem; then you'll keep working these problems until they say you've mastered the appropriate technique. There's a lot of pluses for it, but there's also a lot of negatives. I know one night I tried to go through all of it myself very quickly, and I was finished with one section—and this was late at night—and I typed in one wrong thing, and it said I had to do five more of these. I thought, "Oh my God, who has

> the patience to do all of that?" It's unforgiving. On the other hand, it gives you a lot of practice. You eventually find that you've mastered an area. The department likes us to use it, so I try to use it for the course.

CB added, "I learn a lot from what they are getting right or wrong. It helps me to understand what I need to teach and what I am really coming across with." CB continually posed the following questions to students, "How can we solve the problem? What techniques can we use to solve the problem?" Asked if quieter students might express individual concerns through CATs, CB responded, "I'm not sure. Many times students are quiet because they haven't looked at the problems; they haven't gotten to it. That's my experience."

Similarly, DB, who taught Beginning Spanish, welcomed feedback from students but found that frequent tests and quizzes gave her the most vital information on what her students have learned. "In a language class, I am in constant communication with my students. What they learn and how they learn it is something I am witness to all of the time. In a class with so much give and take, it is easier to see where the learning gaps are." Science professor BB also found that "quizzes are my best tool. They tell me if they're getting it."

CATs often "seemed like an extra" and served a more subordinate purpose in disciplines where learning goals were more clearly measurable and where specific course goals were set by the department rather than by the instructor. Professors in these disciplines believed that quizzes and other measurements were sufficient feedback tools, often felt very pressured for time, and were also unaware of CATs in the Angelo and Cross handbook that do assess skills in problem solving, for example, Documented Problem Solutions. This was a barrier to using CATs. FP commented, "CATs tell you *how* they learn and where they think they're having problems and how I can help them, but tests tell you *what* they've learned—and this is what I have to look at seriously." She later added, "They have to attain a certain level of competency in order to go on with more material or the next course. I get the real feedback on formal rather than informal assessment." Yet, FP recognized that CATS helped her students to better understand their own learning styles and strategies.

> As a math instructor, I have certain topics that I must cover in order for my students to successfully meet the objectives of the course. There's pressure. There's a lot less leeway there than in a class in music history or sociology, let's say. But I do have a lot of freedom in finding ways to get there. So my goals are pretty much spelled out, but my method is up to me. Students give me important feedback on what works for them. I have them fill in the following sentence: I learn best when . . . They answer things like, "When it's visual," or "When the teacher goes very slowly," or "When I work out the problems by myself," or "When it's quiet in the room," or "When I'm working with friends." These comments make students aware of themselves as learners.

BB felt that CATs would take up precious time in her science classes and described the pressure:

> I have so much material to cover, I feel that I won't have enough time to get it all in. Students who are in my lecture class have their labs with a mixed group of students coming from the lecture part with other teachers. I have to make sure my students are ready to go to the lab. If I run behind, they won't have the information they need for the lab to make sense. I need to keep up. Anything extra just has to wait, although there are lots of students who won't raise their hands, and I would like to hear from the ones who won't speak up in class.

The issue for CB was not the time involved; he felt that CATs did not provide the spontaneous, face-to-face feedback that he was sensitive to in his classes.

> I'm not sure in a math class if this [CATs] is the best way to help. I don't necessarily see the applicability of it. I look for expressions. I ask the class to tell me what problems they would like to work on. What problems would you like me to do from the assignments? Which question would you like me to work? Many times the whole class will be working problems; there will be no new material presented. I do a lot of teaching strictly by solving problems because

> that's the nature of what mathematics is. And sometimes while solving a problem I see that we've spent half the class doing it, I'll embellish the problem a little bit and use that as the teaching vehicle for the new material I want to present.

However, CB saw the possibilities of applying a business practice to teaching practice—using general questions as a precursor to quantitative assessment. He envisioned this as open-ended questions first, resulting in more structured math assessment tools later on.

> What I would believe in doing is to try to develop more quantitative assessments of what's going on. That's a little more helpful. Sometimes the open-ended questions would be good if they led to a structured questionnaire; I think that would be useful. These are techniques that we often use; we used them in business on employee morale feedback. We asked open-ended questions one year, but the next year we would now know some basic questions to ask. We could ask them in a quantitative way, Do you prefer A vs. B? This can be adapted to math. You could ask, What method do you prefer the instructor to use in teaching a particular topic? What type of problem did you enjoy solving? Were there any special techniques that were useful? And the following year you could do a quantitative thing. How important do you think that problem XYZ is to understanding the course? How applicable is the method you used there to other problems? What was qualitative one year could be turned into a quantitative measurement the next year.

The reality for CB, however, was that his students had to be prepared to take a final exam written by the department. "They have to reach a certain point before they leave my class. They have to be ready for the next level. That's really the important thing, so I have to stay on schedule; I have to cover a certain amount of material." He concluded, "There's improvising in how to teach, not what to teach."

Adjunct faculty participants who taught courses in which the learning goals were outlined in the college catalogue but were more open-ended, teacher-generated, and not quantifiably measurable, seemed more relaxed about the timeframe for reaching learning goals and were willing to set aside considerable time in class to address learner self-awareness if needed. CP, an adjunct professor teaching early and modern art history, accepted the responsibility for "helping students learn to be better learners." If her students gave her feedback that suggested difficulty mastering the content, she turned to other useful handouts for support. She said, "I provide students with material to learn and material to help them with their learning. I give them "Tips to Help You Study" and "Tips on Test Taking" and "How to Succeed in College." We read over them together."

Most CATs are designed to be anonymous, yet this is an option left open to professor discretion. As a result, the question of honesty surfaced during the interviews. One adjunct faculty participant was sensitive to student concerns about the consequences of answering honestly, claiming that students were still wary even when the CAT remained unsigned. Some adjunct faculty participants felt that students were never secure about the process either way. This was not a barrier to using CATs, but it did provide a challenging aspect of CATs that might not be recognized at first. DP said,

> I tell my students I need their written feedback on the course through one or two questions. I keep it simple. They're just like everyone else—too many questions and they tune you out. At first I had them sign their names, but all I got back was things that were pleasant to read, mostly complimentary. What I needed to hear was deeper concerns. Once the names were off, they opened up more, especially by the second or third questionnaire in a semester. Only then did they let down their guard and tell me what they were really thinking. I know though that there are students who never let down their guard. I try to ease them into this, but some refuse to believe there won't be repercussions. Fortunately, I don't need honest feedback from every student to get a better handle on my teaching. But I explain often why I need the feedback so that more of my students will answer freely.

EP concurred, "I think that the feedback has to be anonymous; only then do students feel free." Use of CATs, it was generally agreed, can be facilitated by clear instructions on their use and explanation on why and how CATs are being distributed by the professor.

The interviews revealed that while some of the adjunct faculty participants leaned on CATs to obtain feedback from students and guide them in instructional decision making, others found that they often relied on intuition or their many years of classroom experience to guide them through tough situations. Relying on "gut feelings," as they were called, was a barrier to using CATs. For example, FP said, "I do value written feedback, but I must say that I am constantly watching student faces. When I see a face that says all over it, 'thank goodness you didn't call on me,' I know I have work to do." CB said, "I prefer verbal feedback first, but I can always do a follow up in writing if I don't feel comfortable with something." EB described his method,

> Read *The Republic*. Read it carefully, listen to what it says. Socrates was a peripatetic teacher. Peripatetic simply means walking around, and he taught his students walking the streets of Athens. I walk around my classroom. If you're sitting in the third row, the fourth seat, I might come and walk down that row. I might sit or kneel next to your desk. And I'll talk to you. Now the rest of the class wants to eavesdrop on our conversation; that is perfectly all right, but I am teaching you individually, and that happens with every student in my class. I can do this with classes of 60 to 70 students as well.

At times, adjunct faculty participants felt they could forgo CATs. Here are examples of what participants had to say:

> Sometimes I don't think I would need this [CATs]. You can tell by their faces or they don't warm up during a discussion. When things are lively, you know it's going well. When their faces say they're half asleep, you know it isn't. Written feedback comes in when you are in that middle range, when some people are energized and some aren't, or when there is a flutter of activity and it dies out quickly. That's when feedback is most critical for me. (EP)

> In a subject like this [Sign Language] you have to be a committed learner; these are not just memorized facts; these are motions, and they need to be acquired intimately. It takes a lot of time. I give them a video—Introduction to Sign Language—I tell them to watch the video over and over, until they feel they are going to puke, and then I tell them to watch it 20 more times. I don't need a CAT here; I know the problem here. Less than half have spent time with the video at all. They do have to memorize this stuff. They need to be there with it, and they cannot conceive of what that means. And they don't realize what is involved in that for signing. They know how to memorize facts, but these are motions. And these are so very complex that they have to own it. They can't just call up the fact and put the fact out. It has to be faster than that. If we had to stop and think

> about everything we did when we are about to speak—we'd have to think about breathing in, holding the air in our lungs, releasing just enough, moving the tongue here and there to bend the air stream to make the noises—if we had to think about all of that every time, we'd never get a sound out. They have to be able to do that with sign language. They have to be able to do it with their hands. It's hard to get that through to them. (EV)

FV often asked for feedback spontaneously, "There is nothing formal. I have an open relationship with my students. I ask them, 'Am I on target or not?'" DV said, "I have been teaching for so long. My students aren't afraid to express themselves. Maybe I use CATs subconsciously. I don't think it's so formal anymore, something I have to come up with. It just kind of happens. I think for people who have been teaching for a long time, it just happens. For people who don't have the experience, whatever, CATs would be very useful tools for them."

There was some evidence of burnout in the use of CATs, posing an additional barrier. One adjunct professor felt that CATs "no longer provided the kind of insightful information that they once did." Another just slowly stopped using them as extensively as he had a few years ago, "It's like a lot of other things that you do and then suddenly realize that it's not as interesting as it once was." A long-term Valencia adjunct professor, DV commented, "I think they are incredibly good indicators of what is happening in a classroom, but I have become a better judge of what is happening. After 20 years of doing this, I can get a feel for things without students actually putting it into words. There is something to be said for teaching experience. That doesn't mean I won't use written feedback again at some point, but I've just put it aside for awhile." Reintroduction of CATs to all faculty every once in a while seemed like a promising idea to CV, who thought that "good ideas can always use a little reinforcement." All participants in the study, adjunct faculty and faculty development administrators, felt that CATs are a learning tool and are not a classroom exercise to be performed without reflection and change. One adjunct faculty participant summarized this effectively: "If I ask questions I already know the answers to, what is the point? Then I'm just using CATs to say I'm using CATs."

Linking CATs to End-of-Term Student Evaluations

Adjunct faculty participants and faculty development administrator participants also mentioned that CATs have practical applications; recognition of this potential facilitated their use. While some adjunct faculty participants preferred to talk about the way in which CATs opened communication channels between professors and students, other were upfront about the effect of CATs on end-of-term student evaluations. EP was quick to comment that she believed her college looked closely at them "because that's all they have to go on" and those evaluations impacted on rehiring. BB felt that her college "takes evaluations very seriously." FV agreed, "I think the administration looks at them very carefully."

Most adjunct faculty participants, however, felt that the evaluations only influenced rehiring in departments where there were several contenders for an adjunct faculty position. "Sometimes they just need a warm body in the classroom. Even if your evaluations are dismal, they'll take another chance on you," said one adjunct faculty participant. But by and large, the comments seemed to imply that CATs were an avenue to pursue when it was a personal or professional goal to generate favorable evaluations. Faculty Development Coordinator AV remarked, "Sometimes it [CATs] might appear to be encouraging people to do a midterm evaluation, although it doesn't sound like it right off the bat." Many adjunct faculty participants experienced improved evaluations as a result of this intermediate step; their explanations for why this happened varied. Some felt that CATs siphoned off individual feelings of frustration with the course or the instructor; others felt that CATs reflected teacher sensitivity, and students responded to that in a more gentle way.

> Midterm assessments are tied in, in a way, with student evaluations at the end of the term. Students who test and challenge me aren't as judgmental at the end of the term—if I respond to what they wrote, that is. Otherwise it's payback time. We are told that our student evaluations will pick up if we get feedback all along. I think this is true . . . at least it's been something I've experienced. (BV)
>
> I read CATs and my student evaluations very carefully. I tell my students this when I hand them out. Obviously, CATs are not "weighed" the same way, if that's the word, because they aren't reviewed by administrators or anyone else. But I do take all comments seriously. What is interesting is that my students tend to see me in a better light at the end of the term because of it. Maybe they like that I showed a sensitive side; maybe they like that I do change some things. (DP)

Adjunct faculty participants often compared long-range and short-range benefits of CATs and student evaluations. FV said, "Student evaluations are helpful to me, but for the next group [of students] coming through, pretty much." This statement captured a quite pervasive sentiment among the adjunct faculty participants: What a professor learns from the end-of-term evaluations can only impact future classes; the feedback is often too late to motivate change and lacks immediacy. In contrast, DP used quick, formative feedback, resembling the Angelo and Cross Classroom Assessment Quality Circles to change her syllabus midcourse. On her Getting To Know You form, she referred to this as "tweaking the syllabus." She felt this was more important than end-of-term evaluations, which only benefit the next group of students.

> That's one of the reasons I revisit my syllabus with my students several times a semester. I ask them, "Let's look at the syllabus again. How are we doing? Are you getting what you expected from this class?" We think as a group about what needs to go in and what needs to come out. I retype the syllabus and hand it out during the next class.

Using CATs improved student/teacher rapport, later reflected in student evaluations, when professors responded to the feedback in CATs. Students judged a class in more positive terms if it was "a class where we bonded" or "a class that clicked," as a few adjunct faculty participants described those situations. DV maintained that his students were "savvy consumers" who knew the difference between professors who merely acted like they cared and ones who were genuinely concerned with student success. CATs as a classroom exercise were a hollow tool if they did not lead to some type of connection. One adjunct faculty participant, who used written feedback only sporadically, felt that CATs, just like any other type of expressed concern on the part of a professor, could result in better evaluations because students "see you as more human."

FB thought that student evaluations were pivotally important in the renewal of an adjunct professor's contract for the following semester; however, she believed that student evaluations would become less important in the hiring process in the future. Therefore, in her estimation, CATs can only help improve the likelihood of renewal of a semester-long contract or attainment of a full-time temporary position.

> When you adjunct the first semester, the boss looks at student evaluations pretty carefully. We've had adjuncts who have been dismissed. This is done on the basis of student evaluations. And I think that's very good. It used to be that adjuncts have a chance of being promoted to full-time. We have several full-time people in the department who started as adjuncts. With the ethnic diversity issue, that's not going to happen anymore. They are going to pull from the outside.

Overall, the attitude of adjunct faculty participants toward student evaluations was reserved; as feedback, they provided too little information, too late. FP said, "We don't get student evaluations back until the next semester. By then the comment is old news. By the time the school returns them to me, it's usually a year later. What good is that?" From their discussions with the researcher, it was also learned that the adjunct faculty participants found that the fast turnaround time for CATs made them a more valuable gauge on how a particular way of teaching was affecting student learning, and more effective methods could be explored immediately. Faculty Development Administrator AV felt that "end of term is not valuable information for changing the course or for redirecting yourself." He was more committed to midcourse assessment techniques that could lead to swifter modifications. Only in unusual circumstances were the evaluations a learning experience. For most of the adjunct faculty participants, student evaluations were improved by midcourse written feedback, but those final evaluations had less impact on rehiring in disciplines with few available, qualified adjunct professors. Most of the adjunct faculty participants felt that the student evaluations carried more weight during their first or second semester of teaching; new teachers with poor evaluations were not asked to return. That led one adjunct professor to say, "CATs would help a new adjunct with her evaluations, but new adjuncts often don't use them."

Although all three colleges used similar standardized forms for end-of-term student evaluations, Valencia was considering a change because the present form "does not generate terrific information." This may facilitate use of CATs in the future. AV described what his college is doing:

> There's a faculty committee looking at this. . . . Faculty are going to help design a more valuable student evaluation. Faculty are involved. This is a change. This is a change that has to do with some of the learning paradigm discussions, and it has to do with the personality of the president in charge. He really is careful about this sort of involvement of the people who are going to be needing to know this information. They [the faculty] are the people who should be designing it.

Chapter Four Conclusions

Encountering the task and tackling the basics of CATs revealed some of the barriers that inhibited community college adjunct faculty use of CATs, as well as insight into how these barriers had been overcome. First, time constraints were frequently cited as a barrier since distribution of a CAT demanded several minutes of class time to focus on an additional activity, requiring an explanation on the part of the professor and often generating questions on the part of students. Reluctance to use class time on CATs was overcome by recognition that the benefits of CATs far outweighed the time involved and that, in the long run, CATs saved time. Hearing individual student concerns on a CAT helped professors pinpoint topics that needed to be reviewed. CATs removed the "guess work" out of the assessment process so that areas needing reinforcement, targeted for a specific group of students, could be addressed before a quiz, test, or graded assignment. Second, the Angelo and Cross handbook, while detailed and thorough, often represented an overwhelming volume of text to read, functioning as an encyclopedia of CATs rather than serving as a guide. As a result, adjunct faculty relied heavily on CATs introduced to them, depending frequently on the One Minute Paper and The Muddiest Point for feedback. This barrier to using the wide range of CATs in the handbook was overcome by adjunct faculty who saved an assortment of "successful" CATs alongside course notes. Also, adjunct professors who designed their own CATs were more likely to revisit and reuse them each term. Third, in disciplines where specific learning goals were set by the department and a level of competency had to be obtained before advancing to the next course (i.e. math, science, foreign languages), adjunct faculty felt that formal rather than informal assessment was more valuable for both professor and student. Quizzes and tests were judged to be sufficient feedback tools, creating a barrier to the use of CATs. This was difficult to overcome; adjunct faculty in these disciples seldom recognized that the handbook of CATs addressed more than grasp of course content. They were less cognizant of the role played by CATs in two other subcategories, especially those related to learner attitude, values, and self-awareness, as well as learner reactions to instruction and the learning environment. On occasion, this barrier was overcome by professors who did recognize the ability of CATs to turn the attention of both students and instructors to the importance of study skills, attitude, confidence, and "comfort level" with the material. Narrowing CATs to the single role as a preassessment tool for content mastery was overcome by familiarity with the myriad of functions that CATs can serve. Fourth, another concern, perhaps not a barrier, was student honesty and candidness while filling out a questionnaire. Adjunct faculty felt that their students were wary of the possible repercussions of answering honestly, even on an unsigned CAT. Professors who overcame this concern found that repeated use of CATs allayed student fears because CATs became part of the class routine. Informing a class of what was learned from a CAT and how that information would lead to constructive change substantiated the claim that CATs were being used to improve teaching and learning; students gained confidence in the process. Fifth, relying on "gut feelings" proved to be a barrier to using CATs, especially for professors with many years of teaching experience. Adjunct faculty who overcame this barrier were those who were occasionally surprised at the mismatch between their perception of what was happening in class and the response of their students on a CAT. Similarly, professors who relied upon verbal feedback often found that CATs let them hear individual voices and concerns. Sixth, burnout was cited as a barrier to using CATs; professors began to tire of using them. This was overcome by adjunct faculty who valued CATs as a feedback tool for students to see themselves as learners and as a stimulus for professors to both reflect and change.

Encounters with the task also revealed facilitators that encouraged use of CATs. First, institutional commitment to CATs furthered adjunct faculty use of the techniques. This was important for stimulating first time use of CATs and for providing information on the "research base" for CATs. Retracing the steps taken by Angelo and Cross as they developed the Teaching Goals Inventory and compiled two handbooks of CATs reinforced the foundation upon which use of CATs rests. Adjunct faculty formally introduced to CATs had a better understanding of their purpose and their essential place within the context of a learning college. Visits by nationally known speakers familiar with the benefits of using CATs generated more interest in them. Second, ease of use and the uncomplicated nature of CATs facilitated their use. While some professors adhered to the same "favorites" every semester or gravitated toward those that were department "standards," others enjoyed experimenting to customize CATs to meet changing needs. Third, use of CATs was facilitated by their flexibility. Those adjunct professors who routinely used them found that CATs could be adapted to find out what students already knew (bridging new material to their background knowledge), what they were learning (gauging their progress), and when they were reaching learning goals (preparing students for summative assessments). Fourth, judging CATs to be a formative assessment tool of genuine value, one that helps professors make instructional choices, also facilitated their use. CATs were appreciated for their immediacy and sensitivity. Fifth, adjunct faculty believed that the use of CATs developed naturally from a need for professors to communicate with students; this was often sparked by specific concerns or the uneasy feeling that "things weren't right." Use of CATs was facilitated when professors wanted to reduce the "me versus you" feeling in a classroom. Sixth, adjunct faculty status was a facilitator to using CATs. Faculty development administrators at all three participating community colleges described adjunct faculty as being open to new information and eager to accept new challenges. Last, the link between CATs and end-of-term student evaluations facilitated use of CATs. Adjunct faculty participants commented that their evaluations improved as a result of CATs, and positive student response to professors was still a key piece in the rehiring process.

Chapter Five investigates the use of CATs and encounters with oneself, providing additional answers to the research questions.

CHAPTER FIVE

ENCOUNTERING ONESELF

Overview

A fundamental area of discussion with adjunct faculty participants and faculty development administrator participants was the extent to which CATs fostered change and the eagerness with which professors pursued CATs as an opportunity or avoided them as a threat. Many conversations with the researcher centered on taking a risk and the professor's thoughts about using a method of formative assessment that could potentially open the door to criticism. What surfaced as a strong finding was not just the potential vulnerability of the professor who used CATs, but the fact that CATs were "self-imposed" risk taking. When choosing to use CATs, a professor was "deliberately sticking his neck out," as one adjunct faculty participant described it. The strong element of personal choice was a result of the fact that CATs were not a mandatory activity at any of the three colleges. Therefore, in attempting to understand the meaning of the phenomenon, the experience of using CATs, the research uncovered the incentives that motivated individuals to move beyond the surface to a deeper exploration of the classroom experience. The study looked at the readiness or reluctance of professors to solicit feedback and then cope with the emotional consequences.

Encountering oneself addressed taking a risk with CATs, disentangling CATs from the instructional paradigm, recognizing oneself as researcher through CATs, linking CATs with a dedication to teaching, and improving teaching effectiveness through CATs.

Taking a Risk With CATs

Although CATs were characterized as simple, easy to grasp, and uncomplicated, they signaled for some individuals the beginning of a new type of expanded college classroom. AV described the situation by comparing the way professors have traditionally protected the privacy of their classrooms with the way family members retreat into the seclusion of their homes. Those long-standing traditions are hard to change.

> Teaching is a very personal thing, and one of the items of the learning agenda is opening up the privacy of that classroom and really having a culture where people are not so much surveilled and are less of a "private community" or "gated community" and become more of an "open door" and "front porch" kind of thing, where faculty wave to each other and sit in each other's classes and so on. But we have inherited a tradition of privacy about what goes on in the classroom.

Implied in AV's description is the suggestion that the front porch, in essence, can make a home a less isolated place and can serve as an extension visible to people walking by, inviting them to share some time with the occupants. Similarly, the learning paradigm, which thrives on discussions about learning, is not an invasion of privacy in order to pass judgment on what transpires in a classroom; instead, it extends what goes on in the classroom and brings it out into the open.

The general consensus among faculty development administrator participants and adjunct faculty participants, however, was that classrooms cannot be "yanked open," and professors cannot be forced or intimidated into re-envisioning their role as teacher and learner. CP distinguished between professors who are receptive to new ideas and those who are not.

> You can't legislate what happens in a classroom. Teachers are either open or closed to learning. Some are cold and never change what they do. There will always be people like that. I'm 54, and I'm not finished learning. I am committed to the "expandable self." This doesn't mean that each and every one of us has to reinvent the wheel; we can just be aware of all that's out there. . . . People who think they know it all have limited themselves.

Therefore, a barrier to using CATs was not only reluctance to enter into a potentially vulnerable situation, but a vision of oneself as a teacher who does not have to "expand." Adjunct professors, like full-time professors, can become set in their ways and resist outside suggestions as a type of intervention. Teaching, for these individuals, is highly guarded.

Both adjunct faculty participants and faculty development administrator participants mentioned personal motivation as a strong facilitator of adjunct faculty use of CATs. AB said,

> How important is personal motivation to use something like this? I'd have to say a hundred percent. Personal motivation is so important to change, to doing something differently, especially when it comes to making changes for the sake of others. It is expected here that you want to improve.

Likewise, AP commented,

> A motivated teacher can use CATs to find out quickly how an adaptation in teaching has impacted on students with different learning styles. The real plus is their [CATs] immediacy. This fits in with the way we see ourselves here—highly student centered.

All of the adjunct faculty participants, even those who felt that other formative assessment methods gave them more useful feedback, concurred that professors who incorporate CATs as a classroom activity do so because they want to improve student learning.

The researcher observed that adjunct faculty participants with strong personalities were as receptive to the idea of "teacher as learner" and the learning possibilities of CATs as those who were more laid-back. The intense personality of EB suggested that he might be an individual who was unresponsive; his comments often seemed overly confident, such as "My classes are filled the day they're open, and in all the years that I've read student comments, I can only remember two students saying something negative about me. My students tell other students, 'you've got to take this guy.'" Yet, a commanding personal style was not necessarily the sign of an unyielding teacher. EB described CATs as an opportunity for personal and professional growth:

> Classroom Assessment Techniques can tell you in the middle of the term how you're doing. That's not a scary experience—no it's never a scary experience—it is an enabling experience. You ought to listen to your students. That's why you're here.

While the faculty development administrator participants did not feel that many professors, full-time or part-time, had an "I-know-it-all attitude," as AV described it, they felt that learning to be a more effective teacher requires time and effort. "Teachers can learn to be good teachers. The attitude that 'I've learned it all'—that attitude is rare, but it really irritates me. There's a lot to learn about being a good teacher—there's a lot of work involved." All 3 faculty development administrator participants felt that adjunct faculty are receptive to the idea of working toward improvement; AB said, "There's strong personal motivation among adjuncts to move ahead and make changes, and they are willing to do this for their students." AP commented, "For an adjunct, something like

CATs has a lot of value for the time invested. CATs can help them to try and do something new or experimental. At least you find out right away if it has potential." A few adjunct faculty participants felt that reluctance to change is not a sign of a teacher who is overly confident, but simply one who does not want to put in the effort to change. It was CV who identified a loss of interest in teaching and apathy as far greater barriers to using CATs. She mentioned that some professors refuse to revise and rework their courses "because they get lazy. They pull out that same syllabus year after year."

Many of the adjunct faculty participants saw a relationship between professors who do not ask for feedback from their students and those who rely on lecturing as the singular instructional method. They believed that there is a link between professors who remain physically separate from students and those who remain emotionally distant as well. DV believed that professors who keep their distance have long standing personality traits that support the behavior.

> There are people who stand rigid behind the podium and do not cross this line. Mine holds my book, and I only wander over there just to check and make sure that I didn't skip something I wanted to cover. That's the extent of what it's there for. Some people like to keep their distance; I don't. It's also true about negative feedback—I have no problem with that. People who can't handle that won't use something like CATs. I don't know if you can overcome that—that just might be inherent in some people's personalities.

EB was also critical of professors who hold fast to one way of conducting their course—standing in front of students and delivering a speech, "Our news commentator read what other people have written. They read off of teleprompters as if they are puppets. Unfortunately, we have a lot of teachers who teach the same way."

Overcoming sensitivity to feedback from CATs was often difficult. EV felt certain types of feedback made her more defensive, and specific criticisms were upsetting to her.

> Criticism can inhibit me, and I find that specific criticism is harder to deal with. I have to defend myself. A general, generic, sort of fix it, you can deal with because you can do what you want to fix it. But when someone comes back and says, specifically, this is the problem, and you need to change it this way—that narrows my options. The option they choose may not be an option that works for me. If the criticism is general, then there is more for me to work with; there's more wiggle room. With CATs, I have more trouble with something very specific a student says. I have to say that I can take it to heart. Something more general lays it all out, and I can work with it, and I'm willing to try new things.

EV discussed how most students credit her with good class organization, but one dissenting voice can be very troubling. Similarly, many of the adjunct faculty participants expressed overreactions to comments relating to orderliness, demeanor, or favoritism, and "things about you as a person, not just you as a teacher." Comments that make professors slightly uncomfortable, however, are often the ones that help them to grow. EP had a meaningful revelation through a CAT.

> While I don't like negative comments, a solid suggestion lets us in on what we're doing, even when we don't know we're doing it. One student wrote in a CAT that I always responded to insightful comments from students with a positive comment of my own, to dull comments with total silence. This confirmed in a student's mind that what they said was dumb. The student suggested that I help students follow along a line of thinking until something interesting or insightful comes out of it. When I read this student's paper I realized that I was passing judgment on my students by my silence. The worst part was I wasn't helping them to enter into the conversation—in fact, I was discouraging them.

In contrast, some adjunct faculty participants never had an unpleasant experience with CATs. FB said, "I don't ever recall anything so negative by a block of students that I was shocked by it."

Since all the participating adjunct professors described situations in which they have used CATs or would consider using CATs, they addressed the need to accept the feeling of vulnerability and turn it, instead, into a challenge. In most instances, this feeling was overcome by "looking at the comment with an open mind." EV stated, "Yes, it can be a painful process when students are bluntly honest, but you have to think it through and remember it's one person's perspective. And I may not agree with it; I may not want to fix it. On the other side, I may want to make some changes." Most participants described their own willingness to hear the students' concerns even if the information made them uncomfortable.

Vulnerability, therefore, was overcome by recognition that the goal of learning, by both professors and students, outweighs any uncomfortable feelings. But, as one adjunct faculty participant expressed it, "You're better off reading them at home." FB looked at the experience with humor, " I always keep a few selective ones so my children will have comments about me to remember me by when I die. And it's human nature that the ones that have a negative comment very often end up in the garbage."

A few adjunct faculty participants knew how to word CATs so that vulnerability would be reduced. Questions can be directed in a way that the professor is less central and more peripheral. This strongly reduced a barrier to using of CATs. For example, EP preferred asking her students to comment on whether or not an art video had enough value to be shown to the next class rather than asking them to comment on her choice. "I'm asking about the video itself, not my ability to select an interesting one." Several adjunct faculty participants said that they avoided questions that asked, What did you like or not like about a class, activity, or exam? They preferred questions that looked for suggestions and asked students to "brainstorm" or "to look ahead, not back." CP favored questions that made her students "feel like colleagues." The adjunct faculty participants who had been using CATs for several years recognized that the focus of the techniques is on learning and should be designed with that in mind. Adjunct professors who were able to control feelings of vulnerability did not see CATs as a measurement; one adjunct faculty participant said, "They shouldn't be ratings." DV felt that midterm feedback, by its very nature, should emphasize the positive. EV said, "We get beyond the what's wrong, to what's right."

Adjunct faculty participants were also able to accept vulnerability when using CATs if the classroom was a trusting place. Alluded to several times was the importance of the professor's comfort level with students. The following comment summarizes the importance of this.

> The effectiveness of CATs, I think, would depend on trust issues. Students have to feel that I respect them—then they can be honest with me. They can say what's really on their mind. In the same way, I need to trust them. Then I can ask questions that will help me be more effective. When there's trust between students and teachers, the sensitive nature of the feedback isn't as much of an issue. Everyone is a little vulnerable, and that's something we all accept. . . . I have to say that it isn't time that makes this happen because a classroom can be a trusting place pretty quickly. It's something that clicks; it can happen during the first or the first few classes. (CP)

EV emphasized the importance of trust in her sign language classes, "I want them to trust me, to communicate with me, after all this is a course in communication, and I am taking them back to the beginnings of communication . . . so CATs—and I would love to use more of them—blend in with the way the class is already conducted."

At the other extreme, it was not uncommon during the interviews for individuals to mention classes where students were "unresponsive" or "cold." EP described her experience:

> It's tough to take over an art class where students can enroll several times. When I assumed a ceramics class from another teacher who taught it for years, my students didn't like it; they didn't like any of the changes I made. They said, "That's not the way she did it." They had a real chip-on-the-shoulder attitude. The feedback from these students—written and unwritten—was harsh. It was quite rough on me emotionally. They were basically saying, "I know it all, now bug off!" I listened but also remained committed to the way I like to do things. I'm a rule keeper. I like an art class to be a relaxed place where people can relax and be creative, but there has to be some structure, too, some structure to the course. I was well aware of how they felt about my taking over—very well aware. I found it helpful to be polite, to ease them into my way of doing things. This wasn't going to be a test of them versus me. I said things like, "You probably know this, but let me go over it or let me review it." Their comments were sometimes hurtful, but I learned how to handle a situation that was going to be a disaster if it went on for too long a period of time. Looking back, maybe their letting go of some hostility toward the changes, and toward me, was good. It's just not easy to be the teacher in that situation.

While this was a unique situation in which a professor had to win over students who could repeatedly enroll in an art class and were accustomed to another way of having the course conducted, EP's comments suggested that feedback from the students was unpleasant to read but prepared her emotionally for the job ahead. It also gave her the patience to work at building classroom rapport in a tough situation.

Since most classes commence under circumstances that are less tense than the one described above, professors can begin immediately to develop rapport. CP began her classes with engaging experiences that would build trust. Her method was an adaptation of the Angelo and Cross group feedback techniques.

> Getting feedback from students, any way you choose, is such a fundamentally important part of what goes on in a class that I can't imagine calling something a learning environment without this. I start right away, the first day, letting my

> students know that their input is valuable. I arrange the class into four or five groups to discuss the syllabus. They choose someone in the group who will later speak for them. Later we move the desks back to their original position, and I ask the groups for their comments. As each spokesperson addresses an issue that came up, I hear other people say that this was a question or a concern of theirs, too. Everyone is surprised at how much their group discussions had in common. And then I address the questions or concerns.

CP saw this method as an extension of her overall philosophy of education, "This is a great icebreaker, but more important it lets the class know that I think education is a cooperative experience." DP voiced a similar outlook, "I want to provide an environment in which there is sharing. I don't teach; I share."

Conversations around the topic of vulnerability confronted the question of when CATs should be used by adjunct faculty. No one responded with any specific time frame; in fact, all participants felt that a decision like that was an individual one. One adjunct faculty participant described her experience and her reason for delaying, "I feel that I'm letting myself open to criticism when I use CATs. That's why I steered away from using them at first. It takes a few semesters of teaching before you get a feeling that you're ready." In contrast, faculty development coordinator AV felt that CATs should be introduced as soon as possible, through a variety of programs, and let adjunct faculty incorporate them into the classroom whenever they feel they will be of value. AB suggested introducing CATs to adjunct professors immediately, at their first orientation.

> They may have a lot of things on their mind; there is so much that is new. But I wouldn't wait on this. Some people might think that it's something we can postpone for awhile, but I think a communication tool like this is exactly the kind of thing you want adjuncts to know about. I see the potential for CATs in terms of learning styles; adjuncts at a community college often start teaching unaware of what our student body is like.

Disentangling CATs From the Instructional Paradigm

Two other barriers to using CATs surfaced during the interviews: allegiance to the instructional paradigm, and the viewpoint that CATs are being encouraged by colleges as a way to critically judge teaching performance. Evidence of the first barrier was the "drive" among some professors who felt that their primary responsibility was to cover coursework, often at the expense of setting aside any time for formative assessment. AB commented on the instructional paradigm, "This [paradigm] is focusing on one's teaching—which is something to do to the students. . . . It's not uncommon for a teacher to simply present material and expect students to learn it. As long as you've presented it, you've taught it." DV referred to this as the "big pot, little pot" theory, whereby the teacher's job is simply "to pour information into their students' heads." Time constraints and a large volume of course content to cover place CATs as the last item on a long list of things to do. Reducing this barrier to using CATs means changing the focus to the learning paradigm. When student learning is the primary focus, formative assessment tools gain in importance. BP said, "You don't create a learning environment by walking into a classroom and presenting material." AV commented on the uneasy shift to the learning paradigm for some professors:

> We're a profession that's really hard on itself. Teachers are such driven people on so many levels. We haven't been as attentive to the learning question. Are these people learning? Can they learn better? Can we be an important factor in that equation? How can we get people to learn more? There are fascinating questions like, How do I know they're learning? How do I measure the learning meaningfully? I don't see an end to the paradigm shift, to the emphasis on learning.

CATs, therefore, become a more important tool as professors move away from "what did I teach" to "what did they learn." CATs that are written from the perspective of the learning paradigm are also less threatening to the professor. Faculty development administrator participants and adjunct faculty participants who recognized this commented, "It becomes about the learning" or "If I ask a good question, I feel I am opening up communication. CATs are lines of communication."

Second, CATs must be presented from an institutional perspective as an instrument to help professors, not one that can be used to judge or criticize.

> CATs are not for surveillance. Faculty like the evidence it gives them to talk in a grounded way about what are the students experiencing in my classroom. Doing whatever we need to do to get a faculty member to ask for feedback directly from a student—What are you learning? How are you feeling?—anything along those lines is a positive. It's not like we have put our faculty members in the position of being students and we're the master teacher. It's more like we're helping them investigate something they care about. We give them an idea, and then it becomes their idea, and then they go and do something with it. It's ideal for faculty development in that way. CATs are immediate, and they don't require that you change your course, but they perhaps give you the motivation to learn more about different avenues for reaching students or how to interpret the feedback. (AV)

Recognizing Oneself as Researcher Through CATs

Although the adjunct faculty participants did not refer to themselves as researchers, there were comments that alluded to "things I was curious about" and "I wanted to know why this particular class wasn't working." BP felt strongly that a classroom conducive to learning is not automatic, "like a room assignment. The old myth, if you will, is that a classroom is transformed into something new just by the teacher's presence. It's just that to me, it's a myth. You have to have strategies, plans; there has to be a method to your madness." FV said, "I want them to learn, not just pass tests. I want to make sure they are actually learning." The emphasis on "making sure" is when the professor becomes an active investigator.

Comments were evenly divided among the adjunct faculty participants concerning the events that triggered use of a CAT to investigate learning. Some described situations in which they wanted to reassure themselves that the learning they assumed had taken place was, in fact, able to be demonstrated. Others wanted to understand why learning the material was difficult. This division echoed the two questions in the classic Angelo and Cross CAT, the One Minute Paper, where students briefly describe a topic in class that is clear, as well as one that is unclear. Some professors, therefore, gathered more information about the connection between their teaching and their students' learning by hearing about the strong points. Others learned more about themselves by confronting weak areas of instruction.

Several adjunct faculty participants described situations in their classes that surprised them in their quest to better understand student learning. CB mentioned several times an interesting phenomenon in intermediate algebra test scores:

> My students give me feedback on my exams. They prefer multiple choice where there are several possible answers to choose from over an exam where they show their work. Having a couple of choices makes it easier, they say. The interesting thing is they all have the feeling that it's easier, but the averages on the exam are the same. . . . I have discovered in the three sections of this class that there is a great deal of correlation between the grades on exams where they can be given partial credit for their work—and exams which are multiple choice. You can predict scores on this—the multiple choice—based on the other. The average, the mean, the standard deviation are just about the same for all of them. I can still tell by multiple choice what I need to go over. And the students absolutely prefer it. Hands down.

CB found that multiple choice exams gave him more than enough information on how effectively he taught. "I learn a lot from what they are getting right or wrong. It helps me to understand what I need to teach and what I am really coming across with." He experimented and researched his teaching effectiveness, changing and making adaptations from one class to the next.

> I teach the course three different nights, and so I may start out doing something in one class, change it by the time I hit the second class, and I'll even do it a third way with the third class. And sometimes, when I like how something has turned out, when I go back to the first class again, I may start out the period by saying, "This problem we've looked at, here's another way of doing it." I do this because I found it resonated more than the first way; from that point of view, I'm adapting.

Similarly, in his government course, faculty development coordinator AV used a formative assessment similar to the Angelo and Cross Paper or Project Prospectus to see how students' understanding of a concept changed over the semester.

> He [Thomas Angelo] used to teach government, and there are things he did that I've modified. One of them is to ask students to write a short essay about what they know about democracy. I keep it on file. Later they have to reflect on that first essay, the quality of that first essay, and it comes across to them as kind of an easy write about what they now know and a chance to reflect on the first day. But for me, the bad news is when the second essay is not a lot different from the first essay, and that is a measure of my effectiveness. That can hurt. That's risky. This is a different quality of information. It shows me concretely how a student's understanding has changed—largely as a result of my course, my efforts.

In her interview with DV, the researcher sensed that the connection between teacher and learner, the spark that jumps from one individual to another, was still a mystery. While he felt that CATs provided him with important feedback on student learning, DV expressed several times an uneasiness over whether or not he could really claim responsibility for what his students learned.

> CATs have merit. I think it is just flat common sense. If you are doing anything, you need something to help you sit back and evaluate what you're doing. One of the biggest concerns I have with teaching is that the end result is so amorphous. Is it because of something I did, or did they just pick this stuff up because they held a book close to their chest? That's why around my house every time I have a

> vacation I'm creating some sort of tangible product. Look, I built this deck. Look, I did this. Where the product comes from in teaching isn't that clear. You wonder sometimes—is it because of something I did, or could this kid have taken this book and learned this all by himself? Sometimes I want to take all the credit, but I don't know.

Linking CATs With a Dedication to Teaching

Adjunct faculty participants with a genuine love for teaching seemed less uneasy with feelings of vulnerability. They were eager to receive feedback from their students and to respond to it. Strong dedication to teaching facilitated use of CATs. Response to the question—Why do you teach?—was often quite dramatic. EB, who has taught as an adjunct professor since 1971, said the following:

> People ask me when I'm going to retire. I tell them I will retire when they drag my cold dead body out of the classroom—that is the day that I will retire—that could be at 70 or 80 or 90. As long as they let me walk into a classroom, I am going to teach; this is what keeps me alive mentally. This is what keeps me alive physically, too. This is why I wake up in the morning. . . . After teaching, the rest of the world is boring—it really is—look at what the rest of life is made up of—you watch the ball game on Saturday, you go to Wal-Mart, you cook your food—but to look into a kid's eyes and to know he gets it—he really gets it—he may not understand all that he's getting, but he's started, he has started to think.

EB summarized his feelings with the statement," Teaching feeds my soul."

Similarly DP made the following comment, "Teaching is my high; it's my drug." CB was "sidetracked" from his teaching career for many years and has only recently returned to it.

> I find the experience fun. I love teaching; I really do. After I finished my doctorate, I went back to my undergraduate institution. I originally intended to be a full-time teacher, and I was going to work for one year before taking a full-time faculty job—and one year became 30 years. I just recently went back into teaching. I just wanted to do it. . . . I never thought I would be teaching intermediate algebra; I thought I would be teaching calculus or advanced courses mathematically related, but I was sitting with my wife at our club, and we would

> hear students talking about calculus AP and the like. They would come over and ask me questions. That was the immediate impetus. It was fun and exciting.

Faculty development administrator participants and adjunct faculty participants shared the belief that every professor can learn to be a more effective teacher. DP offered her solution for stale teachers, "I'm totally self-driven. I need to know if things worked or didn't work in my classroom. I think we should have 'sell by' dates for teachers. When you're outdated, off the shelf you go."

All of the adjunct faculty participants voiced strong feelings that good teaching is tied to in-depth knowledge of the content area, and effective teachers keep up-to-date in their fields. DP said,

> I'm always in Barnes and Noble looking up new ideas on business, leadership, teaching. I keep up with my field; I look for new ideas. My course keeps changing with the times. How can it not, with all of the changed technology, crises in the stock market, a new world order? How can anyone teach a business class with the same syllabus year after year? There are a lot of adjuncts teaching business who haven't been in the business world in a long time. For them teaching is just something to do. It's easy for people to become behind the times. They don't bust their assess either to make the classroom work. They think a dull classroom means there are dull students. I don't buy that. A dull classroom is the sign of a dull teacher.

CB assumed what he called a "traditional position," offering the following explanation:

> I come from the school that says there is nothing like mastery of the subject. You can teach me all the ways about how to teach, but if you don't know the subject, it's not going to be successful. But this is the old school approach. . . . I think you need to concentrate more on the level of proficiency as opposed to a method of how do you present the material. That's my personal bias.

Many of the adjunct faculty participants viewed teaching as an art or a "natural gift." While they felt that new adjunct professors who walk into a classroom unprepared to teach will be very surprised by what they need to learn, most believed that teaching is a creative activity that comes from "a desire to communicate with people" or "to change lives." Although many idealistic comments were made about why they teach, learning "how" was harder to pin down. Some adjunct faculty participants felt that specific experiences in their past impacted on the way they now teach. Participants were asked about their knowledge of teaching/pedagogy by their own estimation, how they learned to teach and how they would compare their teaching styles to the experiences they had as students.

> When I was a student I was taught the same way that I now teach. I had a rather fortunate educational experience. I went to a very small school in Memphis, Tennessee, which is now called Rhodes College. It consistently ranks in the top 10 in this country academically. It is one of only four colleges in the nation which still uses the tutorial system. I took my Plato and Aristotle philosophy class with only two students and the professor. We met in the library; we met in his home. He'd come over and sit in our rooms. I can't ever remember being in the classroom. And it was a six-hour course. That's the equivalent of a six-credit course. He would see us on campus and say, "Where do you want to meet me this week?" And we would sit and talk about Aristotle and Plato. That's where I'm coming from. I can maintain those types of relationships in my classroom because of the techniques that I use. (EB)

> I learned about teaching from watching other teachers. When I was a student-teacher doing an art internship, I worked with a teacher named Roger. He was wacky, crazy, totally erratic. The students loved him. There was no discipline, no order. I remember him doing cartwheels in class. He was great fun, but a hideous teacher. He said, "It doesn't matter what I do; if they're an artist, it will come out." But he thought he was a good teacher; he wowed the administration with his student evaluations. For my own teaching, I followed two others a little more closely, two high school art teachers. One was Connie. She was excellent on content. But she was a strict disciplinarian, like Hammurabi's Code, "If you don't like my rules, too bad." And there was Beth who was nurturing, but not too hard, and not too soft. I experienced all three. I siphoned off from all three of them. Some spontaneity, good content, fair rules. (EP)

> The only teacher that I can think of that inspired me was in middle school. I grew up in a little town called Haines City, probably 30 miles from here. Very small town, 8,000 people maybe. But this guy managed to bring a singing group like the Grass Roots, who had a bunch of top 10 singles, and he used to bring groups like that to Haines City for the kids to have something to do. And I know what always amazed me—the efforts this man went through to do something for the

> young people in the community. He cared about us. And that's probably always stayed on my mind. (DV)

> I was very young when I completed my degrees, a bachelor's at 20, a master's at 21. Part of that was 18 credits in pedagogy at Adelphi. So, yes, I had some courses which dealt not only with content but with delivery of content. But, teaching was still very hard for me at first. I was very young. . . . I was an adjunct at Queens College and taught the history of photography; that was the first time that course was taught there. I certainly didn't learn anything about teaching when I started work toward my doctorate at the Graduate Center, part of City University. I had some of the most brilliant minds in the field of art history, like Rewald, who wrote a text on Impressionism and Post Impressionism and Brown, who reviewed the famous New York Armory Show. They were brilliant in their fields, but the worst teachers I ever encountered. They were scholars, but not teaching models. Maybe I learned from them what not to do. I thought right then and there that I could do better. I keep active in my classroom; I move about the room. I look students in the eye when they speak. In class I am the energizer bunny—I keep on ticking. (CP)

> I don't think there is such a thing as learning to become a teacher. I think you model yourself on the people that you feel did the best job for you. I had teachers who presented the material in a very structured, vigorous way; I had other teachers who just said, "Let me work the problems." So some would be structured, and some would work a problem and say that we are going to develop what we need while we're solving this problem. We'll develop the mathematical tools that are necessary. I've had good teachers in both camps. And both of these were excellent models. Depending on the material, I will use one method or the other. It depends on the material, and it depends upon the class. (CB)

> I think that my teaching scuba diving has had an effect on the way I teach science, even if this sounds strange. In scuba, you have to go from A to B to C to D. It's very systematic. Mastery of one section is a must before you can go on. Your life is at stake. This way of moving step-by-step and building one thing upon another is very conducive to teaching science. (BB)

DB, an adjunct professor teaching beginning Spanish, had a double major in college in romance languages and secondary education. She described how her studies affected her teaching:

> Mr. R taught the methodology course and also supervised my student teaching. He would come and observe and evaluate me; he made an impression on me—one that I still think about—when he said that an effective teacher is 50% knowledge of the subject and 50% personality. It's very important for a professor

> to communicate their love for their subject. . . . I guess I'm from that vintage, from the late 60s and early 70s. I would have to say that in general pedagogy, I'm not up-to-date. But when it comes to how to teach Spanish, I'm there.

FB learned to teach "by a combination of influences." She had three professors in graduate school whom she admired, and she still finds herself "using the same phrases they used about noticing and observing how you feel, responding to what you're learning at all times." FB also claimed that her teaching continually improves by her attendance at conferences, such as the Southeastern Regional Conference for Two-Year College English Teachers' Association. "I go to the seminars—I listen to the speakers—I take handouts."

Most adjunct faculty participants insisted that it is only through the experience of working with students that one learns to teach. Math professor FP said that she learned to teach by "working with students who have a difficult time."

> I found out I had a gift for teaching math when I was in high school. We had a poor math teacher. My friends came over and asked for help. I became the teacher because someone needed to do it. They said, "Why didn't Mr. Lewis tell us that?" He was brilliant but couldn't explain anything. He would say, "Here's another example." And we would say, "We didn't even understand the first example." Pretty soon everyone stopped listening to him. I found I was able to explain it. It's still like that. I have a knack for explaining it. If the problem says solve, the answer should look like this. I'll show you how to get there. I'll show you the map. I always use the road analogy.

EV thought of herself as a teacher when she was only a first-grade student herself. She came home each day and "made my sisters do what I learned that day. You learn to teach by doing it. I was also a tutor for many years at local high schools." DP had an experience which altered her perception of the place of education in a much bigger picture.

> I learned about teaching from Palm Beach Atlantic where they welcomed me both as a person and a student. It was in their master's program that I learned about teachers as facilitators, not just lecturers. . . . My experience at PBA moved me in the direction to get feedback from my students. Without that program, I wouldn't be a teacher. It is a Christian school, and the feeling is that we take care of each other. The Christian part is invisible, but it's there. I want to apply what I learned in that program. I want to give back.

Improving Teaching Effectiveness Through CATs

The adjunct faculty participants responded positively to using CATs as a tool to increase teaching effectiveness, despite feelings of vulnerability. Those who voiced, "I continually want to improve," thought that CATs could positively move them in that direction. When asked if CATs were a fad, most adjunct faculty participants and all faculty development administrator participants did not see CATs as "time-bound"; one individual commented, "They will always be a great idea." However, FV said, "I wouldn't call it a fad, but things come in phases. I think people might find they are becoming too cumbersome or too cliché; that's true of anything; things go through a sort of rotation. But then you could come back to something like this." She later added, "I like to have a whole bunch of back-up stuff. Sometimes people go back to an older technique—let me try that again." CV concurred,

> It only might be a fad if it's where we might be placing the emphasis this year. But will it ever go away? Well, is group learning going away? Is active involvement in the course going away? None of this goes away. We just become more adept at it and incorporate it, and we move on to something else to incorporate along with your CATs, your active learning techniques, your group discussions, et cetera. It's just trying to evolve.

Yet, 2 participants were wary of what could be learned from CATs—by the nature of the question, the professor can ensure a particular answer. CATs have the potential to serve an emotional need for praise rather than true learning. DP commented, "You can pull the wool over your own eyes if you want to." AP said, "The greatest drawback to this can be asking questions where you really only hear your own voice; teachers can design questions where they get the feedback they want rather than the feedback they need to hear." All of the participants felt that this type of self-serving behavior would be short-lived. DP's description of her experience is an example.

> This kind of feedback can help me help them, really help us both. When I first asked for feedback, I wanted to learn about me, my teaching skills. Then I realized what a waste of time that was. I started to write questions that let me in on what was really happening in class. How can I help you to understand this material?

Several adjunct faculty participants insisted that CATs were an unnecessary learning tool in what they described as "open classrooms." BV felt that CATs provide redundant information when there is already free exchange. "In a class that is so open, less formative assessment is necessary. They know they can come to me, sometimes individually during my office hours, or I run ideas by them as a class." Other adjunct faculty participants were convinced that no matter how openly professors think their classes are conducted, CATs let them hear what the individual student has to say. FP said, "The fact that each student puts down in writing their own thoughts, you don't get the conformity you might get when the class discusses something out loud, when you tend to roll with the flow." BP felt that professors "need to be cognizant of every student in the classroom so that students don't fall through the cracks." CV commented, "You hear individual voices with CATs. You wonder what the kid in the back, whose hand is not up, is thinking." The difference between unsolicited student feedback and written, anonymous CATs was explained by AV:

> Another pitfall for teachers who wait for students to come forward is that one student who is extroverted or vocal distorts your sample. They leave you feeling good or bad about what's going on in your class—leaning on that one student who talks to you about what is going on. I like the different anecdotes that we hear from teachers now based on what students are saying on CATs rather than "Here's what I did, and a student came up and talked to me about it yesterday, and that person liked it." That's all well and good, but it's not giving you a real broad picture; it's not really challenging you with information you might need to listen to. This [Classroom Assessment Techniques] is a much more systematic, useful, anonymous method for dipping into what's going on in the class.

There was a firm consensus of opinion among the participants that teachers who do not want to use CATs will not learn anything from them, and those teachers who do not want to learn anything from them will only use them to appear responsive. None of the faculty development administrator participants entertained the idea that adjunct professors would use CATs to appear responsive or for "appearances" at all. They felt adjunct professors use CATs as a learning tool, not as some "touchy feely gimmick." They supported this claim by mentioning the time constraints that adjunct faculty are under, and that "adjuncts wouldn't waste time" on something that is not directed toward learning. When asked whether professors can use CATs in such a way that they become ineffective learning instruments or fall short as feedback tools, AV responded,

> If that's the case, what you need to do is to do things more than once. You have to feel comfortable taking a risk. That's part of our job to build that environment. When you put something in terms of, here's a Preconception Check, let's see what your students know that's inaccurate about physics or something, it's not very threatening to you as a professor. But if you also have a Post-Learning Check on how have you changed student misconceptions, that's closer to home as a measure of how effective you're being. That's more risky, but that's when you learn.

All of the adjunct faculty participants wanted CATs to remain an open door of opportunity for professors. When asked whether CATs should be mandatory, all felt that a requirement like that would meet with resistance, potentially setting up an emotional barrier. EP said, "Simply suggest CATs as a type of enrichment. Teachers will take it from there." While time constraints were cited as a problem, some admitted that their natural reaction to the word "mandatory" was negative. FV said, "They [CATs] are meant to help, not just become another burden. They need to be optional. Time is often a problem. . . . If I had so many things that I had to do, it would take away from why we are here." FV was quick to describe a rebellious response to CATs as a teaching requirement, "You have a different attitude if you choose it or if somebody says you have to. I know how I am when someone tells me I have to do something; automatically I am going to get bristly." EV argued that, "If CATs were mandatory, it would come up against people's affective filter—their cultural or personal way of doing things. It may offend them and set up a block." Faculty Development Administrator AB said, "Nothing required flies really well."

Most participants believed that professors who use CATs are sincere in their desire to receive student feedback; yet, a few were wary of the ability of CATs to generate change. One adjunct faculty participant commented that there is a tendency to use CATs to send a signal to students saying, "I care," without making any adjustments. But, it was acknowledged that the value of CATs is in caring enough to change and to "do something in situations that aren't working." Faculty development administrator participants believed that adjunct faculty are unlikely to participate in an activity that has no real value as a learning exercise and that adjunct professors who use CATs are motivated by concerns that are not self-serving at all; AV said, "It [CATs] becomes about the feedback real fast; it becomes about what the student is saying."

It was generally agreed that CATs have the potential to begin the learning process for teachers, to bring them out, in a sense, onto that front porch, which AV had described.

> For some teachers, the classroom is a place where I deliver something to students, and they deliver something back for a grade—rather than looking into how is the learning happening. By what process is the learning going on here? It's [CATS] a low-level intervention in that it doesn't require change, but it does motivate changing, like maybe I need to rethink the way I'm doing this. Or, maybe I need to revise what my goals are for this course. Those kinds of conversations shoot off from having engaged in Classroom Assessment Techniques. So rather than end there with what the student is learning in the course, it generates reflection on how I am doing as a teacher. It is a really significant tool for us. We drop it in all of the programs that we're doing.

FP commented, "We need to see ourselves the way others see us. Something like that is an ongoing process. Teachers constantly need to take a fresh look at themselves."

Chapter Five Conclusions

Encountering oneself—moving beyond the basics of CATs to an area of personal reaction to what is learned by using the techniques—also revealed some of the barriers that inhibited community college adjunct faculty use of CATs, as well as insight into how the barriers had been overcome. Although CATs were characterized as simple, easy to grasp, and uncomplicated, they often represented an unnecessary risk or a type of self-imposed vulnerability.

First, at this personal level, the difficulty of changing the long-standing tradition of the privacy of the classroom began to surface. Use of CATs challenged the traditionally "guarded classroom" where learning takes place in an environment free from outside interference. This barrier was overcome by adjunct faculty participants who recognized that the emphasis on learning extends what goes on in the class, creating a "front porch" where ideas can be shared. Understanding that their classes were not being judged or surveilled moved professors away from the carefully guarded, isolated classroom. The barrier was more easily overcome when classrooms were not "yanked open" and professors freely entered into the process. Those individuals who reenvisioned their role as both teachers and learners, embracing the concept of the "expandable self," moved closer to embracing the idea of a protected but less secluded classroom. Second, the perception that CATs were a way to judge teacher "performance" was a barrier to using them. This was overcome by adjunct professors who recognized that CATs were not a surveillance device; they served, in contrast, the goal of improved teaching and learning. Third, a barrier to using CATs was sensitivity to student feedback. Often this was the justification for not "sticking my neck out." This was overcome by adjunct faculty who accepted vulnerability, turning it instead into a challenge. For these individuals, the goal of improved student learning far outweighed hurt feelings. To reduce the amount of personal criticism generated on a CAT, professors looked at comments with an open mind, worded CATs carefully so that the individual professor was less central and more peripheral, directed CATs toward learning issues not personal issues, and emphasized the positive—going beyond "the what's wrong to what's right." Another way to overcome this barrier was to make the classroom a trusting place since trust and communication go hand in hand. Many adjunct professors began immediately, during the first class, to build a foundation of trust. Fourth, a barrier to using CATs was allegiance to the instructional paradigm. At times, the strong drive to cover coursework in a timely manner came at the expense of using formative assessment techniques. The instructional paradigm, visualized as a big pot pouring information into a little pot, reduced the teacher's role to providing content, and responsibility toward students ended there. Adjunct professors who overcame this barrier moved beyond "what did I teach" to "what did they learn." Fifth, some participants believed that there was a relationship between rejection of CATs and reliance on instructional techniques that distance professors from their students, for example, lecturing from a podium. Physical separateness seemed related to the need for emotional separateness. The desire to "move among students" as a facilitator of learning and generate a feeling of connection was linked to use of CATs. Sixth, it was acknowledged that a barrier to using CATs would be an "I've learned it all" attitude, although faculty development administrators saw little evidence of that, but it was agreed that a willingness to work toward improvement was essential. Emphasis was placed on the word "work" and a readiness to overcome stagnation, for example, refusing to revisit the same syllabus year after year, incorporating new instructional methods, or actively searching for ways to make course material exciting. Accordingly, adjunct faculty found that CATs had a lot of value for the time invested. Seventh, CATs were deemed unnecessary by adjuncts professors who felt that CATs were a redundant tool in an open classroom. Adjunct faculty who overcame this barrier found CATs provided some reassurance that individual students would be less likely to "fall through the cracks" since each person's voice had a forum. It was also acknowledged that CATs moved beyond the conformity of thinking that classroom discussions often generated. Those discussions, while valuable, were feedback tools that often masked personal or more unique concerns. Last, a foreseeable barrier to using CATs was making them a mandatory activity. Adjunct faculty and faculty development administrators recognized that using CATs or requiring a set number of

CATs per semester would lead to resistance and resentment. Mandatory use of CATs would pose a new barrier.

Encountering oneself also revealed facilitators that encouraged use of CATs. For many adjunct professors, CATs signaled the beginning of a new type of expanded college classroom. First, the strongest facilitator to using CATs was personal motivation, generated by the desire to teach effectively and improve student learning. Second, use of CATs was facilitated by letting the decision to use them come from professors. A comfort level for using CATs was reached by adjunct faculty who initiated use after they felt "ready" and prepared to be receptive to student feedback. Third, use of CATs was facilitated by adjunct professors assuming the role of researcher of student learning. Although the adjunct faculty participants did not refer to themselves as researchers, some of their comments alluded to an informal type of investigation into student learning and learning improvement, plus the effectiveness of instructional practices in a variety of settings. Some adjunct professors gathered information about the connection between their teaching and their students' learning by concentrating on strengths; others learned more about themselves by confronting weak areas of instruction; and on occasion, adjunct professors used CATs to understand how an individual student's grasp of a concept changed over the semester. Fourth, love of teaching facilitated use of CATs as professors respected student feedback and enjoyed the challenge of responding to the comments. All of the adjunct participants agreed upon the importance of a strong knowledge of the content area and acknowledged that effective teachers keep up-to-date in their fields. Dedication to the teaching profession was often a positive response to teachers in their own past who served as role models; some adjuncts professors combined characteristics that they admired in more than one of their teachers. All expressed the belief that by working directly with students one learns to teach. Accepting teaching as an "art" that creatively blends many experiences, past and present, facilitated use of CATs. Fifth, the desire to improve—continually—was another strong facilitator to using CATs. Accepting the ongoing nature of improving teaching effectiveness motivated adjunct faculty to use CATs. Last, CATs were not considered a fad by those adjunct professors who recognized the value of using them. Adjunct faculty who expected to learn from CATs did not design questions in order to generate the feedback that they wanted to hear, but rather the feedback that they needed to hear. CATs were not a "touchy feely gimmick," but were an effective assessment instrument.

Chapter Six investigates the use of CATs and encounters with others, including students, other faculty members, and administrators, and answers several of the research questions.

CHAPTER SIX

ENCOUNTERING OTHERS

Overview

A fundamental area of discussion with adjunct faculty participants and faculty development administrator participants was the degree to which CATs contribute to communication between adjunct professors and the typically diverse group of students at a community college. The study looked at the ability of CATs to create channels of communication between adjunct faculty and students and to build a shared focus on learning. The study also investigated the extent to which use of CATs generated conversations on teaching and learning between adjunct faculty and other faculty members or administrators. CATs did not prove to be a way to open the door to exchange of information between faculty members on what goes on in classrooms and how learning goals can be reached. The data revealed that adjunct professors were comfortable discussing CATs in general, and colleges were supportive of their adjunct faculty using formative assessment. However, informal conversations about a specific situation in which a professor used a CAT, how students responded and what was learned from the experience, were noticeably avoided. The subject of CATs, therefore, was not one that spontaneously arose in conversation; in fact, adjunct faculty participants preferred to keep the results of CATs private. Only 2 of the 15 adjunct faculty participants shared actual CATs, distributed and collected in one of their classes, with the researcher.

Encounters with others addressed communicating with students, other faculty members, and the college administration.

Communicating With Students

All of the adjunct faculty participants liked teaching at community colleges for their emphasis on teaching and rapport with students. The majority said they "loved" it. CV's comments were typical: "I love teaching at a community college because the emphasis is on the student and the interaction between a student and a teacher. The students really need us to get going. We have a huge percentage of first generation students. . . . The first thing people need to know is these are not substandard students. We don't teach basketweaving." The sense of being needed and functioning in the role of a helper as well as a teacher was particularly satisfying. All voiced sincere concern for student learning; FP described a typically strong personal commitment to student learning goals: "To be an effective teacher you have to meet students needs—whatever they are. It's the role of the teacher to help students get whatever they need to learn and learn well."

There was also a noticeable link between use of CATs and references to new ways of distributing "authority" within the classroom. By creating many channels of communication, adjunct professors were not abdicating their responsibilities, instead they were building a shared focus on learning. The best example of this was a statement made by DP: "I use the collective brain power in my classroom. Yes, as an instructor I have the sheriff's badge on, but I don't strut around to show it off. I'm only more experienced than my students; I'm not smarter. I think of myself as a facilitator sharing my knowledge." CP said, "I don't like thinking about the power structure in the classroom. I like to think I work in cooperation with students. I do hope they pick up on my excitement and my curiosity." The vision of students and professors working in tandem to reach goals greatly facilitated use of CATs since they contributed to the collaborative nature of the learning process.

One of the greatest areas of concern for adjunct faculty participants was the "generation gap" between themselves and their students. Some participants expressed feelings of frustration with students; this emotion resounded in statements such as, "It's a different world today." FB said,

> I like to feed off the energy in a classroom, but I'm surprised the students are at such a low level of energy. We are an intellectually curious generation; they're more commerce oriented. . . . They're saying, "I'm taking this course for three credits, to get a degree, to get a better job. I want to graduate and get my life in order and get a good job so I can buy stuff. Buy a new DVD." And this has nothing to do with intelligence; it has to do with the culture we live in.

BP looked at the generation gap as a contrast of verbal versus visual learners:

> We have become a visual society, and we have to contend with the MTV generation. They're used to visual stimulation constantly and are not used to people instructing verbally. Even if you have an overhead projector or handouts or maps, things like that, still most of the instruction centers around a verbal exchange between the instructor and the student. So you're trying to combat the fact that these people get most of their stimulation sitting in front of the television or Nintendo game, or worse yet, in front of the computer. The group I have this year is the worst along those lines; it seems as though they have to be visually stimulated in order to function. They aren't going to get that in life. Palm Beach [Community College] has tried to address this by providing as high tech equipment as they can in the classroom—overhead projectors, VCRs, DVD players, Internet access, but the technology has a purpose. There is still your instructor, and the instructor uses the technology to help Technology can never

> take the place of the instructor. They need to hear us. We create the productive learning environment.

Several adjunct faculty participants were aware of professors who "refuse to budge" on the issue of changing how they teach to reach today's students. This was a barrier to the use of CATs. EP said,

> Adjuncts often think, "It can't be me, it must be them." They dig in their heels and become more rigid. When they say, "I'm not going to do anything different," I think to myself, "But what if no one passes the test?" This is one thing we need to talk about and try to lay to rest—the me versus them.

One adjunct faculty participant commented, "We hear a lot about learning styles, but I think we need to move back one step more to something even more fundamental—wanting to learn." She later added, "No matter what your learning style is, you have to put in some time and energy. I will bend over backwards to help my students, but half the equation is what they're willing to put in." EV felt that the lack of motivation was only a symptom of a deeper problem:

> They're not self-motivated enough—the majority unfortunately—I don't even know that they're not motivated enough. I think it's that they don't really know how and, more important, they don't even know why they would want to do that. That may have to do with the way they expect instant gratification. And again, they're very young; they're living in the here and now. At 51, I've gone past the here and now. There are consequences to every choice that you make, and for them the choice is tonight or tomorrow.

Adjunct faculty firmly entrenched in the idea that "I can only do so much; the rest is up to them" used CATs for feedback on course-related knowledge and skills, but rarely turned to CATs for feedback on attitudes towards learning. Convinced that the problem was solely a student problem, one adjunct faculty participant said, "When you know what the problem is, CATs are unnecessary."

However, at the other extreme were adjunct professors who had reached the same impasse with their students but were looking for ways to overcome it. While the majority agreed with the fundamental premise that the responsibility for learning rests in students' hands in learner-centered classrooms, they wanted to provide environments that coaxed students into becoming active learners. CATs helped them to create classroom settings that pulled, rather than pushed, students. Therefore, attempts to link generations often facilitated use of CATs. DV felt that one of the areas of difficulty in building such a bridge was that professors, who were often "good learners," were out of touch with students who struggled in school.

> The problem you run into is that most of us who teach are pretty good at the school game. We didn't have a lot of classes with those people who were not very good at it. We may have gone out to parties with them, but we didn't sit in a classroom with them; they were in different sections than we were. For all intents and purposes, they did not exist. We may have noticed that people weren't passing classes, but we just thought that it was because they were lazy or they didn't do the homework or whatever. We didn't think they might just not have the skills level to do it right then.

Later, DV added the following comment:

> People are often hired to teach in higher education because of their knowledge, not because of their ability to communicate. And that's where you run into problems. When you have good little robots—like you and I probably were—we will absorb anything no matter how it is thrown at us. But most of the students are not good little robots anymore. It has to be worked at more than a little bit.

DP looked at the younger generation of students in her classes as a group that had been conditioned improperly in earlier grades. Accustomed to "being pushed," they learned to respond to external motivators, while an innate desire to learn was squelched.

> One of the most important questions I ask my students is, "Why are you in college?" They say they need the degree to get a particular job. Right away I know that the desire to learn is buried pretty deep, especially in the 18 to 19-year-olds; they are so used to sitting and being lectured to; they are so used to someone

> pushing it down their throats. Some teachers here say these kids don't want to learn—I don't buy that. I don't think it's because they don't want to learn; it just hasn't been their experience. For most of their years in school we destroy the desire to learn. High school especially does a terrible disservice.

BP said that his students in his political science, sociology, and anthropology courses became more aware of those "internal motivators" when asked for feedback on the following questions: What brought you to college? What did you expect to get out of college? What brought you to my course? "Those questions help students to see themselves as inquisitive, as people who are curious about government or politics. They begin to realize they want to be here or they wouldn't be here." Many of the adjunct faculty participants had developed ways to effectively motivate students to accept the challenge of learning; these were in contrast to external motivators, such as deadlines and grades. CP found that the desire to learn caught on in her classroom through her own enthusiastic behavior.

> What I really present is modeling behavior; I present a way of being—so that no matter what my students are preparing to become—an auto mechanic, a fireman, a nurse, a teacher—they know that their own motivation to learn is what is important. They see my energy, my motivation. Learning is a very individual process, and motivation is the key. But I don't expect them to become engaged in this if I'm standing up there droning on and on. They see my interest. They hear my questions, and I ask lots of questions. They see me as a learner, too.

Most of the adjunct faculty participants found that a relaxed classroom was conducive to learning. The desire to create a comfortable learning environment facilitated use of CATs. BV qualified that by saying, "By relaxed, I don't mean anything goes. There's a syllabus, which acts as a contract, and I have set grading criteria, but I want a certain comfort level in here." FP placed a strong emphasis on the ability of CATs to reach her students; she wrote on her Getting To Know You form, "I think that students feel more a part of the class when they have input into the class, whether that input takes the form of their being free to ask questions or giving feedback to the instructor on what works." CP found that "collegiality" developed differently in her studio and art history classes; her authority as a dispenser of knowledge was more acute in art history classes, setting up a more hierarchical relationship.

> Studio art classes are unique types of classes with different kinds of concerns. My students are fairly confident. No matter what questions I ask them, I'll get straightforward answers to them. In these classes, I'm really asking them for suggestions and treating them as colleagues. My art appreciation classes and my art history classes are different. I am interested in the information, for example, they retain after a slide show. If I've put up 19 slides, I want to see if that's too much, or I jumped through them too quickly, or 45 to 50 minutes of lecture is too much. Sometimes we're so far apart.

All adjunct faculty participants and faculty development administrator participants were aware of the hectic lifestyles of their students. DB found that she had to always keep in mind that the circumstances under which she went to college were different from those of her students, "I was a kid. I had no job—everything was school. Today, students have a lot going on." BB said that her students were "overtasking themselves." CP knew from feedback from her students that their time was often "committed to other things." She looked at this, however, from a positive viewpoint and said, "I really feel for these kids. They juggle school, jobs, family. I think the fact that they're in my classroom is a sign that they want to accomplish something with their lives." Later in the interview, CP expanded upon this idea:

> Everything I do with students revolves around values clarification. When I ask them questions, I am holding a mirror up to them. What is important to you? Some of my students have full-time jobs and take courses, or they take four courses and work 30-35 hours a week. If they don't have time to do the reading, if they don't have time to write a paper, what are they saying about what they value? I continually want them to see themselves. I do this with the material I

> cover; I do this when we talk about life and life decisions. I see a much bigger agenda for teachers in the classroom than just dispensers of knowledge. I speak to students on every concern.

Several adjunct faculty participants, however, were impatient with feedback from CATs when they were merely a forum for students to complain about their lack of time to complete assignments because of outside responsibilities. This proved to be a barrier to using CATs. One adjunct faculty participant said that her students thought of college "like a drive through McDonalds; they want it quick and simple." CB found that he had to tell his students many times, "School takes time; it's a responsibility." CB felt that getting his students to put in the time necessary to master algebra was more of a concern to him than their learning styles. "This is a commuter school. It's a very different experience than going full-time and concentrating on being a student. I have to work with students on that, being a student with so many other things going on in their lives." CB responded to the question—When would the results of a CAT be disappointing to you?—with the following statement:

> It's disappointing when they'd write that time and other stuff like work and family was a problem for completing the coursework. I heard from a student today who said, "I really need to pass this course, but I'm having trouble getting the time. I have a full-time job; I have children; the comp lab is only open at times I can't go; I don't know what I'm going to do, but I really need to pass the course." Now what am I going to say? I get there early; I'm happy to stay late. I'll guarantee you what the answer is going to be—"I can't get there early because of my job; I've got to get home because my husband is watching my children so I can't stay late." So when are we going to get together so I can help her? And then she says she's the type of person who needs to be taught rather than learn the material on her own. How will this ever happen? It will never happen. I mentioned it to the department chairman. What can I do? People have to have time to allocate to this, and if they don't then anything we try to do is not going to be satisfactory. So even if the feedback is "I don't have time," what can a professor say?

DV commented that his students failed to see the relationship between input and output:

> I'm trying to get them to see the relationship between effort and the quality of their work. It is not as clear as you would think. The determining factor of the quality of their work is whether they wrote it the night before or they put the effort in over a period of days. It's a struggle to get students to accept that. They are responsible for the quality of their work.

FB expressed impatience when CATs were an opportunity for students to complain about the workload: "I use CATs to find out if something is really out of kilter and I don't know about it. If students gripe and complain about the amount of work—if that's what I get back from CATs, I toss them."

Other adjunct faculty participants did not dismiss complaints about the workload so quickly. EV learned from both written feedback from students and her own observations that students need to be ready to learn, and that "committed time" is a consequence of that; this type of readiness is not dependent on a student's age or background. EV looked for the point at which an individual becomes a "committed learner."

> Students have to have a readiness. I remember a high school English teacher; he must have had a two-year-old child, I don't really know, because his big thing was potty training readiness. It made an impression on me not only because it was a silly thing for a high school teacher to be talking to 16-year-olds about, but also because I found out it is really true. There needs to be a readiness. . . . When does that click take place? It varies for each student, and I think it depends upon your learning style, your ability, your commitment, what you're putting into it, just how much you want to learn a language. If I could figure that out, I'd write a book on how to teach foreign languages. It's a hard one because it's not knowing facts, it's knowing in your soul. I am interested in how and when do you learn to think in another language, to be comfortable with it. My students don't know why they need to do this—be comfortable with it. For some, their English skills are poor, too. Some want to work a lot in groups, but eventually you have to be able to do it on your own. Learning something like this depends 100% on what you put into it. I knew an 84-year-old woman who wanted to learn Spanish so much she put words up all over her house. Most of my students won't do this. They are married to the English word, the same problem as in all language learning. Sign language has to start to become a part of them—they need to own it—and they have to be ready to do that.

Many of the adjunct faculty participants said that their desire to communicate with the diverse students today motivated them use of CATs. EP looked at this from an adjunct professor's vantage point:

> There's such a variety of students here. Students vary by time slots. My evening classes have older, more motivated students; daytime slots bring the recent high school graduates. For adjuncts it's a tremendous number of variables; you never know what you're going to get since you are assigned classes last. You're lost without feedback. Multiculturalism—here I need extra training. I would love to take a course or workshop that would help me with this. There are so many students from so many different backgrounds in my classes, I can't address them all.

A few of the adjunct faculty participants used CATs to better understand any "agendas" that students brought with them to the learning experience. This added benefit of CATs facilitated their use. According to CP, these can be the result of "misinformation or, just as easily, a lack of information. In art history, many people jump to conclusions about what they like or don't like without knowing why." CATs helped many professors and their students to recognize attitudes and beliefs that were "filters that can color or disrupt learning." The Misconception/Preconception Check from the Angelo and Cross handbook "brings something like this out into the open." CP continued,

> I work on values clarification—what's important to you. I want them to see themselves. The subject matter is visual material, images from art history. But it's in context—we look at art in different contexts, and then I ask my students: What is the function of art in society? What is the function of art in our society? Asking these questions alters our perception of what we are looking at.

Several adjunct faculty participants designed their own CATs to see what perceptions students were "bringing with them; even young people can have very fixed ideas, and I want to have a window on that as I introduce new ideas" (EP). However, there was consensus among the adjunct faculty participants that critical thinking develops in a classroom where students feel that controversial or unpopular viewpoints are as welcome as those that are more mainstream. When the researcher reviewed one set of CATs given to her by an adjunct faculty participant, there was a comment by a student who "liked that my ideas are respected in here." However, there were also comments that students in the class "didn't back up what they were saying." It was apparent to the researcher that there was open expression in the classroom, but the some of the viewpoints expressed were either unsubstantiated or uncontested. Some of the adjunct faculty participants responded to similar concerns written in CATs by asking students for concrete examples during a class discussion or for facts and citations in a paper. BV described the details of one of her assignments, a literary review, which was structured in a way to prevent students from presenting a point of view they were not prepared to defend:

> They have to tell me not only if they enjoyed the reading, but also why. They can't just say, "I liked it." They have to support what they say. So they must include in that supporting details and examples. I do this because so many students today write in generalities. They give you their bones and that's it.

One adjunct faculty participant felt that critical thinking, as well as CATs, would not "find favor" among professors who used the classroom as a forum to present their beliefs. EB alluded to professors who ignored diversity and used the classroom as an opportunity to present a single point of view, mostly their own. Critical thinking was stifled. He strongly opposed those who used teaching to present or "preach" their perspective, especially in specific disciplines. The implication was that a professor who used the classroom as a pulpit would not consider using CATs for feedback.

> I happen to be Presbyterian minister. There is a place in my life where that's the primary function of who I am—on this campus it is not—I am a teacher. I teach

> the religions from orthodoxy to retain my objectivity. I'm not paid by this institution to be an apologist for my beliefs or to be an evangelist for my faith. I'm paid to teach; one of the things I find so difficult is we reach out into the community and we pick up these people who supposedly have certifications and expertise and all of that and then we bring them in the classroom and have them teach . . . and they're going to teach, by and large, from their perspective. And that's not what they are hired to do. . . . Religion and political science are areas where it is particularly difficult for teachers to maintain their objectivity. Especially in religion, everyone thinks they have a monopoly on what the truth is. I tell my students to think, go and find out the truth.

Adjunct faculty participants also found that CATs gave students an opportunity to vent their concerns about learning new material. DP noticed that student response to the Muddiest Point was often the following:

> They say, "This is hard," and they want reassurance that I'll be sure to help. That's where the CAT helps me though because I now have to figure out how to help. CATs don't let you go away thinking you've taught something just because you put up an overhead—if students say they don't get it. This is where the learning paradigm is important. At the same time, it doesn't mean I have to make the material easier, or the tests easier. It just tells me I have to find other ways to help.

One math adjunct professor described how CATs served as an emotional safety valve for students:

> They write about how difficult the material is, how new it is, and these are all things I know. Maybe they feel better just getting that out in the open. But really it's no surprise to me. I really know right away how resistant some students will be.

EV could see the value of CATs in letting students air their concerns, but she found there were other predictors that also indicated how adept they would be at absorbing her subject.

> They could write down their concerns, but learning sign language is a totally new experience. It requires students to let go—this is a language in motion. On the first day in class I show them a Calvin and Hobbes cartoon and ask them to copy the expressions they see. One of them is to put their finger in their nose. Some have difficulty with this. I can tell right away who is going to have to work hard

> if they're going to be successful in this class. . . . I didn't grow up in an expressive family. I know their fear. They have to get over it. They have to loosen up.

It was mentioned several times that CATs can help professors test new instructional methods, especially as they support or frustrate student learning. CB, for example, found that group projects were an imposition on students at a commuter school.

> If you think that the educational process should be a sharing of experiences—working out problems we solve together—they don't have that opportunity in my classes here. It's a different learning environment at a commuter school. It's impossible to assign a group project that we're going to do outside of class. It's not fair to ask it; the chances are students won't see each other at any other time.

AB also commented on CATs and group projects:

> It's important to look into different ways of teaching students. Indeed, CATs can help you find out what works, especially when you try new and experimental things. On something like group projects, you could get feedback that some people don't like group projects. And that's often because not everybody is perceived as doing the work or doing their share of the work. I've been in courses myself where from day one the instructor put us into groups and every single class thereafter we're in groups. Even I started to think to myself—what does the instructor actually do here? . . . We need to keep an eye on things that are new so we see what could be a downside; CATs can help us with that.

In addition, adjunct faculty participants used CATs to hear student reaction to their own instructional innovations. AV found that his students learned the most by continually revising their work: "Some of the methodology of my course is formative because we work on some things all the way along. I honor the idea that students develop by giving them more credit for work done later in the course. Early on I expect them to struggle with something. Drafting, revising, and learning is an expected part of the process. Feedback from students on this is very positive." DP experimented with an assignment that brought business concepts to life in a classroom assignment.

> It's important for me to get feedback on the way I teach business concepts because I teach experientially. That can be something new to students. When the

> subject is TQM [Total Quality Management], I don't just describe it; we put the ideas into action. The class divides into small groups; each group gets six straws, tape, cards, and a black felt tip pen and is instructed to build a house. The finished houses—usually five or so for a class—are placed in front of the room. The TQM Leads has agreed on criteria to judge the quality of the houses, and while they look the houses over, I give my students their break. But they don't go off too far—I see their faces looking in the window, trying to catch a glimpse of what's going on and how their house looks in comparison to the others. When they come back in after break, they find out which house met the criteria of the TQM Leads . . . and they start saying right away that if they had known the criteria from the start they would have known much better how to go about building the house. That's the point of TQM, I tell them. You know something about the final product, and you work on the processes that best help to get you there. Now my students have experienced firsthand the ideas behind TQM. What I have done is create a classroom model that links to a business model.

FB learned through CATs that working film into her English composition classes was a very effective teaching method. Ever since receiving that feedback, she has been able to capture the attention of her audience, bridge the generation gap, and help improve writing skills.

> Now I include film in all of my courses. This is the MTV generation—and I feel film is a motivational tool. I hook them with the things they're accustomed to seeing and then introduce them to composition. I create thematic units and use collaborative learning questionnaires, too, also designed by me. Through these, the students present their understanding of a literary element.

CP used an expanded version of the Angelo and Cross One-Sentence Summary to engage her students with the video on the life of an artist.

> I have a purpose for everything I do in class. We watched a film on the artist Keith Haring. I asked them to write a short summary of what they learned, to apply it. When I show a video, it's not just time to sit back and relax. We come here to learn.

Feedback from CATs often revealed to adjunct faculty participants that their students lacked confidence in their ability to learn—an ability that students often believed was inborn. Many adjunct faculty participants said that comments on CATs similar to

"This is too hard for me" were common. DV saw this type of self-definition as an emotional block that professors must break down.

> There is a misperception by the students that either a student is smart or they're not smart—as opposed to someone who has to work really hard to come to know something well. When a student tells you, "I'm not musical." Well, the game is up if you're teaching music because that person has defined themselves as someone who will not learn it. That kind of self-definition is really hard to bring to the surface and discuss. We did an exercise the second day of class on locus of control, a quick survey that asked a number of questions about their behaviors as students. It was like golf, the lower your score the more you feel in control of your learning. Students who had high scores have got to change their thinking pattern. That's one of their obstacles—that they think there is some other locus of control here—their genes, or their professor—as long as that is situated elsewhere they're set up for a passive learning framework and an excuse for not doing well. With the exception of some students, a very low percentage, everyone can do well in my course.

In his Introduction to United States Government course, AV found that his students backed off from reading original documents. He attributed this to lack of confidence in their ability to grasp difficult material. Changing his methodology to meet their needs, he tackled the material alongside them.

> A dozen or more students really complained in class, and probably on a Classroom Assessment Technique, too, about James Madison and having to read the original Federalist Paper Number 10 because they struggled with it. But part of their struggle was they didn't understand why they were reading it or what they would gain from struggling with this material. It was good for me to hear that. Because as many times as you try to give an overview of where this piece fits into what you're learning, when something is really hard like that 200-year-old document, it can make students feel stupid. And teachers need to be sensitive to that. I resolved the fact that this assignment was tough but important by telling them it was hundreds of years old but challenging, and I would help them to understand it. I took excerpts and had them take them and translate them into modern English with me in class. I videotaped this once and shared it with a group of faculty—one said he would never go to that length to get students to read original material. He thought they should do it on their own. But my reality is that students don't do it on their own. My class created a mosaic of what does this mean. We didn't complete all of it—but we now had a method of close reading.

EB felt that his students had been conditioned to accept ideas, not to question them. He felt his class provided a unique opportunity.

> My students are told to think, and I do not think they're going to get this opportunity in many other places. I tell my students to think, use your brain. Your brain is there for some other reason than to prevent your ears from hitting each other. Use it for a good purpose. There are no stupid questions. There are only stupid professors who do not accept questions. Every question has a reality to it. Every question needs to be addressed. And it doesn't take students very long to realize that they have a right to ask questions.

It became clear from adjunct faculty participants' comments that they feel their students cling to the instructional paradigm. BB said,

> I have two types of students in my basic science classes—those who are here because science is a requirement, six credits and a lab, and they don't like science—and those who are here because they are going into something like nursing or physical therapy and need to get a decent grade in here; they are career and goal oriented, but they also are busy fulfilling requirements and want to know, "What do I have to do to finish?" Both types of students want me to be a fact generator and then tie it all together in a somewhat interesting way. They want me to tell them what they have to learn.

CP's comments revealed that her students not only wanted her to take the active role in their learning, but they expected it. Students not only presume the teacher will spell out what they are going to learn in a course, but also how they are going to learn it. Another adjunct faculty participant described this as "pouring in knowledge." The desire to move students away from the instructional paradigm facilitated use of CATs. CP used formative assessment to prompt her students to question ideas, not just accept professor interpretation; she adapted her methods of instruction for students to take ownership of the material.

> Students take my class thinking I'm going to fill up their brains with something. Sometimes I put lots of notes on the board; this gives them a clue as to what is important, but I constantly ask questions of my students, "What do you think is important?" I want them to know what motivates them. I want them to feel that

> personal tie with the material. I also tell my students, "If you're not doing well, we have to adjust our methodology. We have to find out what's missing and put it in place." Some of my students comment, "I've never had a teacher who cared and changed what they did." I see it this way—if I don't change, I've failed them.

All faculty development administrator participants and adjunct faculty participants agreed that CATs can open the door for students to the learning paradigm by asking them to reflect on course material, individual learning styles and skills, and the instructional environment.

Communicating With Other Faculty Members

Interviews with all 15 adjunct faculty participants revealed that the results of CATs were not shared. Rarely did any of the adjunct faculty participants discuss the results of their CATs with other faculty members, finding them to be a "solitary experience." While CATs were discussed in a general way, "I hear that other faculty use the Muddiest Point," or "It's been suggested that the best time for a CAT is after the first paper or quiz," conversations on specific experiences with CATs were noticeably absent. Yet, Faculty Development Coordinator AV felt that CATs have the potential to contribute to a shared wisdom of practice or scholarship of teaching, "I think that one of the byproducts of the conversation about learning is that people, faculty members, start to share what they do. CATs can open up that dialogue." At the same time, he conceded that his vision of a "front porch" type of open exchange will evolve slowly since the individual classroom has been so closely guarded in the past. He envisioned future exchanges to be supported by tangible documents and concrete facts.

> They're not too happy about letting you see the actual evidence. We have the same response when asking people to share syllabi; they're sort of personal

> documents. At some point I think we need to share this; it's a good step towards this greater openness about what's going on in your classroom. Bringing in classroom assessment materials, bringing syllabi, CATs, handouts, et cetera, are things I'd like to see us do more of. It's concrete sharing of what's going on.

AV continued his discussion of CATs and their relationship to the development of a language or discourse community that talks about teaching and learning with consistency:

> There's a problem when you don't have a language community, when you don't have people sharing the same talk. It's difficult to sustain. I think that as a teacher I would always use Classroom Assessment Techniques in the future; for me, what would be lacking would be colleagues doing the same kind of thing that would allow me to share what's going on. CATs are a good step; I feel sometimes like it's a baby step towards looking into the learning that's going on, pushing us out of the anecdote about here's what I did in class today. Instead, it pushes us toward here is what the students think they're doing—the students keep telling me this. You could put CATs in your bag of teaching tricks, and I don't think you would ever not use them. But those next steps—how will you develop what you do—this really takes a lot of support from the school.

Lost opportunity was an issue that DV addressed when he spoke about the failure of professors to share what they learned as teachers. He felt that isolation from each other was something "teachers just fall into."

> If you're an adjunct and you don't watch out, it is possible you will end up no different than a student who comes here to take one class at night, who is not involved in school on any other basis; it becomes a very cold place. You go to work during the day, you get out of your car, and you walk in here, and you go to a room, and you stay there for a few hours, and you walk back out to your car. And that's about it. You don't know anything that's going on; you don't know people's names. The institution doesn't impose it. It just happens.

DV later explained that in time professors become set in their ways and lose sight of the advantages of new ideas:

> In teaching, you know that when you close the door it becomes your own little fiefdom. And it's kind of like a farmer planting the crops, and if you don't ever see any other farmers, you hoe the rows the same way every year, and you use the same fertilizer every year, and you, hopefully, with a little rain, will get the same result every year. Well, maybe there's a new fertilizer out there, and maybe new

> seeds. A teacher is like a farmer. I grew up on a farm, so I draw those kinds of analogies a lot.

With a similar analogy, BP referred to "teachers who lock themselves away in their own corral. We need to associate with other horses."

While most adjunct faculty participants and all faculty development administrator participants agreed that CATs have the potential to contribute to a general body of knowledge about teaching and learning, there was confusion about the phrase "scholarship of teaching." While faculty development administrator participants seemed more at home with the expression, adjunct faculty participants believed that scholarship was strongly associated with either research within a specific discipline or familiarity with the latest ideas in a specialized field of study. Scholarship relating to pedagogy or the wisdom of practice that results from teaching experiences was foreign to them. Most of the adjunct faculty participants were more comfortable with the idea that a form of scholarship that relates to teaching and learning begins and remains an individual effort. Responding to the question—What do you think could be learned from the shared experience?—most adjunct faculty participants talked about individual learning, including teaching tips, techniques, or strategies that they can take away with them and use on their own. There was an uneasy feeling that a body of knowledge on teaching ultimately becomes, as one adjunct faculty participant stated, "the right way to do things, and then the only way to do things." It was generally perceived that CATs create meaning for individual professors, but as DP said,

> Sharing meaning can become shared meaning, and as much as I want to do everything I can to keep learning and keep sharing with others, I don't want that to come back at me as, what you called it, a body of knowledge. I want to learn and share and then do what I think is best.

A barrier to sharing CATs was not the prospect of exposure to multiple, individual perspectives on teaching and learning, but the concern that a group perspective could emerge, potentially dominating and overriding individual choices and decision making.

Sharing was a topic on which there was a wide range of responses. At one extreme, some adjunct faculty participants felt alone and isolated. CP did not think sharing information on CATs was possible in an environment where conversations and interactions on more pressing concerns hardly existed; she was candid about her experiences:

> I never see any other teachers, full-time or part-time. There's no communication. I hardly even get observed. The associate dean is overworked. I never discuss my teaching experiences or my students with anyone. In fact, you are the first person who has asked me about my teaching. . . . My relationship with other adjuncts is non-existent. I work in a portable now. I put up on the bulletin board some newspaper clippings that deal with topics in contemporary art, topics that would be of interest to my students. The adjunct who teaches in the portable after me took my newspaper articles and taped them over one of the windows to keep the light out. Her slides would show better. She had no regard for why they were on the board. People just do whatever they want without thinking. I honestly couldn't believe it. Communication? Communication about Classroom Assessment Techniques? I'd settle for some common courtesy.

At the other extreme were comments by FP who asked colleagues for advice, especially in classroom situations that were troubling.

> I can get into some heavy conversations with other faculty members. Sometimes you get a class that is a difficult class, sometimes for no reason. It happens every so often; the students don't participate; they are not that cooperative. It's like pulling teeth. My first reaction is—Could it be me? That part of teaching is very difficult. I do ask my co-workers, "What do you do, do you have any tricks or any suggestions or something?"

Several adjunct faculty participants commented on their "separateness," and believed that a professor who comes to campus expecting "to be a loner" will, in fact, stay a loner. FV said, "If you go in feeling you're a separate person, then you are going to be a separate person. If you go in expecting trouble, by golly, you're going to get it. If you go in with the attitude that we're all here for the same purpose, then you all move toward the same purpose."

Most adjunct faculty participants felt that conversations about CATs would be most productive if they were held within the department. In fact, the majority felt that their strongest link to their institution was through the department. That tie was strengthened by mutual interest in a particular subject matter and shared learning goals, yet it was often the result of what one adjunct professor referred to as "niceties" or personal or professional "touches" that make teaching as an adjunct faculty member a much more pleasurable experience. FB commented, "The English department at BCC is inclusive, generous and open towards adjuncts. There is a collective office—we have a phone, we have desks, we have cabinets, we have shelves, we have a computer; they make us very comfortable and happy." Another adjunct professor found that the degree of interaction varied by department. As a professor in both math prep and mathematics, FP witnessed firsthand a difference in the type and number of exchanges:

> The prep math classes have a mid-semester meeting. The idea is simply this: Let's share. The department head sets the agenda. We write down good ideas, and we write down difficulties. We talk about the feedback from students. This is an idea that should be used in every department.

Most of the adjunct faculty participants did not feel that their part-time status was an obstacle to interaction with full-time faculty. BB said, "After time the division goes away between adjuncts and full-time. We have conversations about the students all the time. These [CATS] might be an extra thing to talk about." One adjunct professor felt that "a stratified faculty of adjuncts and full-time people would not be something that would interfere with conversations on CATs. We respect each other as teachers." DB's comments about the foreign language department in her college were typical: "There is tremendous camaraderie among the faculty here. I don't feel that my status as an adjunct is even an issue when we get together. We're a close-knit group in my department." Most of the adjunct faculty participants felt that they had the full respect of their full-time colleagues. FB commented on her "feeling of acceptance" within the college community:

> I am enthusiastic and very motivated—the feedback from the smaller circle of people is rewarding—the full-time colleagues support me the most. They're supportive of my academic endeavors tremendously. They have supported, mentored, encouraged, and treated me like I'm one of them. My position as an adjunct wouldn't have any bearing at all if we talked about CATs. . . . Every once in a while it comes back to hit me in the face—the administration does not really recognize me the way my colleagues do or my students do. Colleagues and students don't care that I'm an adjunct—I'm just a good teacher.

Several adjunct faculty participants mentioned that their conversations with full-time faculty were infrequent because of the time constraints of individuals with full-time teaching schedules and office hours. FV summarized adjunct faculty perceptions of full-time faculty when she said, "My guess is adjuncts are more adaptable than full-time because full-time are given other responsibilities that are more mundane. Full-time may not have as much control over their time as they would like. I don't know this, but that's my hunch." Despite time constraints, many adjunct faculty participants consulted with full-time faculty on specific problems and found that advice was both forthcoming and helpful. Often these conversations were unplanned, with adjunct professors asking questions on the spur of the moment. That spontaneity was suggested in FB's comment, "I always have my eyes open; I hang around the Xerox machine, and I look and see what other people are doing here. I can learn a lot from that one chance meeting on my way somewhere." BP felt he had the respect of full-time faculty members at his college and often found them to be "a valuable source of teaching strategies."

Conversations among adjunct faculty on topics related to teaching and learning, including use of CATs, appeared to be the most limited. FB said,

> They're either too busy working at other jobs or too busy working at many different campuses to stop and talk about this sort of thing. I have no way of knowing if the other adjuncts are as committed when they are actually in the classroom. I don't know if they use CATs. I have no way of knowing. I just know I am committed; I'm very conscientious. I look at my job as full-time even though I'm part-time.

To counteract this lack of communication among adjunct faculty, BV became a part of an Adjunct Focus Group at Valencia Community College, with two adjunct professors participating from each department. At a recent meeting, the topics covered were the need for a Professional Resource Center open during evening hours when many adjunct professors teach, a greater awareness of the untapped talent in the adjunct faculty pool, and better communication. BV said, "I realized if I wanted things to change, I had to become a part of something like this."

While adjunct faculty participants described only peripheral exchanges on the topic of teaching and learning, faculty development administrator participants hoped it was otherwise; they imagined that adjunct faculty were sharing ideas with others but could not confirm this. Faculty development administrators AB and AP expressed similar expectations that adjunct professors were able to find the answers to their questions through a variety of sources, including faculty development activities, orientation, or department meetings.

Communicating With the Administration

All adjunct faculty participants were asked to comment on working as an adjunct professor and the effect of their conditions of employment on their use of CATs and willingness to explore the opportunities of the new learning paradigm. The researcher looked for signs of resentment over salary, benefits, and treatment that could prove to be a barrier to using CATs. Adjunct faculty participants also commented on faculty development opportunities and their impact on introduction to CATs and extended conversations on CATs and teaching and learning.

Most of the adjunct faculty participants were highly critical of the mismatch between the personal investment they made in their teaching and the poor compensation they received. FV succinctly stated, "It really is pretty stinky." CB said he was not on campus enough to know whether adjunct faculty were "slighted" in any way because "I'm not around enough to really know. But, I think the pay is atrocious." EV said, "I could gripe about the lack of benefits—the fact that I pay $700/month out of my own pocket for health insurance—and keep in mind that I travel 100 miles from home to teach here, and move from one campus to another on those days. But I do what I love to do when I'm teaching here." CV, who is teaching six courses this semester because another adjunct professor suddenly became ill, was more concerned with salary than a benefits package because of unanticipated family expenses, "I have very active children who want to be a part of this, that, and everything else." CV also mentioned her previous teaching experiences at a variety of colleges where pay was always scaled to experience. Her comments reflect her reaction to her present situation:

> I have beefs here. I earn the same pay as someone fresh out of graduate school who has never taught in the community college system, and I have 20-plus years of experience behind me. And I know that's not the way it is throughout the country. I feel Valencia is an excellent college, and I know as far as adjuncts and full-time are concerned, it has a lot in place, especially when it comes to the students. So, how can they let this lack of recognition go on? I am surprised. It seems like such a huge disconnect.

Several adjunct faculty participants felt that they were hired "just to put a warm body in front of the classroom." CP said, "I don't think they care who teaches the course. They just fill the space—as long as we have the degree and they won't get in trouble." EP felt the impact quite deeply, "It's depressing to think that it doesn't matter to my position what I do—it matters to students, but it doesn't matter to administrators." FB described the fluctuations in her feelings:

> I thought about becoming politically active; I compared what the school does for full-time people and for us—they only invite adjuncts with a little booklet of development activities. Adjuncts are invited, but is this realistic? I would love to know the percentage of adjuncts that show up. Probably zero. I went through a stage when I was resentful, where I was taking things personally, and I stayed away from everything. But I got over that. The administration uses the adjuncts as a tool for keeping costs down; they do not see us or respect us or regard us as a professional group of professors; so it's all in their attitude. Why don't they invite us to buy into medical insurance after we've been here as an adjunct for X amount of years, maybe five years or seven years? Shouldn't things be available to me after I've been an adjunct a certain amount of time? The first year adjunct and all adjuncts, no matter how many years of teaching, are all regarded as the same. We're handy dandy teaching tools.

Four of the adjunct faculty participants had applications on file and were actively seeking full-time positions at their current colleges. They all voiced frustration. The following statements were made by FP, FB, and CP:

> I would love a full-time position. Right now I meet the 30-hour semester limit with 9 hours of teaching and 21 hours of math lab. The limit is nine courses per year over all semesters, including summer. I have to think about this when I plan my year. I don't think I'll get the full-time teaching job; I do have a chance at a full-time position for running the lab. I'll have to wait and see. I think I'm

> stronger as a classroom teacher, but I need full-time work and benefits and this is what's available. If I get the lab job, it is looked down on by the faculty; I'll lose my status. [FP returned her Getting To Know You form by mail with a notation that she had been offered a full-time learning specialist position in the math lab, to begin on November 1, in addition to her work as an adjunct professor.] (FP)
>
> I have interviewed three times for a full-time position. But it always comes down to a credential issue. I have a master's in the humanities, and here's the irony—my master's in the humanities provides me with an interdisciplinary approach to teaching my subjects. And it's what I use in my creative planning to write up classroom research projects and to be a presenter at conferences. But as far as the college is concerned, it needs to say master's in English. Until it's English, they're not hiring me. And I'm not about to take six credits in English when I've been teaching successfully for 10 years with wonderful success. And now I'm at the point, because of pushing another decade, that I'm not interested. Plus, they're looking for younger, and they're looking for ethnic, and I am neither of those. I can't help who my grandfather is and the demographics of the school—we just hired two young women who were in their 30s; one is Haitian and one is Hispanic. And I really think that that's the way it should be. I think that the demographics of the student body should be reflected in the demographics of the faculty. They should be in balance. But that closes the door on me. (FB)
>
> I drool over the concept of full-time. More than anything I would love the security, the benefits. But I totally separate these feelings from the students. I like the community college; I like the age group. It's like high school without the discipline problems. I teach to a blue collar crowd. For many, English is their second language or they are the first in their family to go to college. For them, going to college is a stretch requiring a lot of sacrifice. I have future paralegals, nurses, or students who want to go on to a four-year college in all of my classes. Many students come to the community college for the cheaper two-year degree and then go on. I do see it in many ways as the American Dream. They have set a goal for themselves. I like my students; these are the perks. My feelings about the fairness of my job are totally and completely separate. (CP)

Five adjunct faculty participants claimed they were not actively seeking a full-time position but would accept one if it were offered to them. At the time of the interviews, they were teaching course loads they were comfortable with and were not, as one adjunct professor described it, "traveling from school to school hoping all of it would add up in the end, because it doesn't."

Of the 6 adjunct faculty participants who said that they did not want full-time positions, 2 cited age or health reasons for their "comfort" with part-time work. Four adjunct faculty participants, who had other full-time employment, were content with their pay as part-time professors. DV, who has been teaching for 23 years at a local high school and serving in the adjunct faculty at Valencia for 20 years, had the following comment: "There are some drawbacks to being an adjunct, but for an added income it's fine; I doubt I would be making these wages anywhere else."

Some adjunct faculty participants accepted the terms of part-time employment as "something you accept or you don't do it." DP said, "Pay is only critical to some people." FB was relieved that she did not have to "run around; I don't have to scramble for income. . . . There's no money in adjuncting so you really have to bust your butt to run around other campuses if this is all you do. I have another source of income, so I am really blessed." BP quipped, "If you can't stand the heat, get out of the kitchen. I knew what being an adjunct was all about before I signed on."

Overall, most adjunct faculty participants accepted the terms of employment. FV went so far as to express gratitude that she was allowed to teach more than the standard number of classes; her teaching course load approximated full-time work. DB voiced contentment: "I never say I'm going to work; I say I'm going to class; I'm going to school. I know other adjuncts who say, 'Why should I put myself out, I don't get paid for this and that.' I never look at it this way." BB wrote on her Getting to Know You form: "I love community college teaching, it's the perfect job for me." DV said,

> I'm not just in this to teach the courses; I'm in this to teach the people. I think that those of us who consider ourselves to be successful at this feel that that's what we're in it for. You will never ever hear me complain about how much money I

> make. I knew that going in. You know Les Brown, the motivational speaker? His old saying was, "If you love what you do, you never work a day in your life." I kind of feel that way about teaching. If you're doing what you're passionate about, you're going to be happy. If you're making money, but you hate what you do, you won't be happy.

None of the adjunct faculty participants felt that the working conditions as an adjunct faculty member affected their desire to teach as effectively as possible. No one interviewed felt any inclination to cut back on what happened in the classroom, including use of CATs, because of issues over which students had no influence. Their commitment to student learning was entirely separate from the drawbacks of their part-time status. None of the adjunct faculty participants felt that low salary or lack of a benefits package was the reason why CATs were not shared among faculty. The overall impression from all participants was that concrete sharing was one aspect of faculty development programs that needed to be expanded if a scholarship of teaching and learning were to be grounded in actual classroom experience. CATs remained a general topic of conversation; the actual documents were not shared. DP was the only adjunct faculty participant who claimed she would not hesitate to "bring anything to the table" when used for a constructive purpose, such as a discussion on what professors can learn by using CATs or what students reveal about themselves through CATs that they might not disclose through other means. Yet, even DP said that she would be reluctant to disclose this information if used by administrators to judge her performance or "to put me under a microscope."

Moving outward to encounters with students, faculty, and the administration—several levels beyond the basics of CATs and personal responses to them—added insight into the meaning that CATs have for adjunct faculty within a wider context. New barriers and facilitators for using CATs were revealed, and, at this level of inquiry, individual experiences with CATs were considered as a potential springboard for collective learning. A technique that created meaning for individual professors was further examined from a shared, group perspective. The data provided insight into CATs and their ability to motivate community college adjunct faculty to shift from a "private" investigation of student learning to a "public" dialogue on teaching and learning and add to the scholarship of teaching.

Encounters with students revealed several barriers and facilitators. First, a barrier to using CATs was impatience with today's students who cope with overextended lifestyles and multiple outside commitments, who have the desire to "get in and get out" of college as quickly as possible, and who subscribe to a more "commercial" and less intellectual outlook on education. Adjunct faculty who saw the failure to learn as a student problem found that the information gleaned from CATs was merely confirmation that students simply did not try hard enough or did not have the time to make college a priority. This barrier was overcome by adjunct professors who created a classroom environment that coaxed students into becoming active learners. Use of CATs contributed to an environment in which students saw both the personal and professional value of an education and one in which students were motivated to take responsibility for learning. Second, adjunct faculty who found that CATs were becoming a forum for students to complain about the workload or the timetable to complete assignments abandoned using them. This was overcome by adjunct professors who used CATs to help students get ready to learn, to invest time in their studies, to see the relationship between input and output, and to become "committed learners." Last, professors who attempted to use classrooms to present or "preach" their own viewpoints avoided CATs. This was not a barrier for professors who felt that their role was to teach students how to think, not what to think.

A strong facilitator which encouraged community college adjunct faculty to use CATs was the vision of the classroom as a place where students and professors work in tandem to reach goals. CATs contributed to the collaborative nature of the learning process. Second, a facilitator to using CATs was the desire to link generations. CATs helped professors to understand the extent to which students today have been conditioned to being pushed through school and trained to respond to external motivators, not internal ones. Correspondingly, professors used CATs as a mirror for students to see themselves as inquisitive and motivated. Use of CATs was further facilitated by the desire of professors to help today's generation of students to see a college education as part of a larger picture. Adjunct faculty who wanted to touch base with a "bigger agenda," to focus on life decisions, found that CATs helped students sort out what they valued, why learning is important, and how college would affect their future. Third, use of CATs was facilitated by the desire of adjunct faculty to communicate with the diversity of students at community colleges. CATs helped them to meet a variety of different needs. Fourth, adjunct professors used CATs to help develop critical thinking skills in their students. They commented that CATs helped students to see their own attitudes more objectively;

adjunct faculty used CATs to help students check their own preconceptions and misconceptions. Fifth, adjunct faculty found that CATs were an opportunity for students to vent uneasiness about learning material that was new to them. CATs reinforced the importance of the learning paradigm; students' concerns were indications that information presented by a professor had not been absorbed. CATs also helped professors to test innovative instructional methods and hear student reaction to those methods. Sixth, use of CATs was facilitated by a growing awareness by adjunct faculty that their students often lacked confidence in their ability to learn. Adjunct professors believed that CATs had value for students who needed to see themselves as learners and to recognize that people do not neatly divide into two groups, "smart or not smart." It was expressed that using CATs reinforced the idea that learning requires work and stamina; setbacks as well as successes are a part of the learning process. Adjunct professors used CATs when students would cling to the instructional paradigm, when students wanted knowledge "poured in" and needed instead to take responsibility for learning.

There was limited evidence that CATs motivated community college adjunct faculty to move beyond their own private investigation of student learning to public dialogue on teaching and learning. Adjunct professors did discuss classroom problems with other faculty, usually full-time faculty in the same discipline, but conversations on CATs were rare. CATs remained a solitary experience. Adjunct professors discussed CATs in a general sense with other members of the faculty, but did not converse with other faculty members on specific experiences with CATs.

Encounters with the administration were also examined for their influence on the motivation of adjunct faculty to use of CATs. Adjunct professors felt that there was inconsistency in the loyalty of administration to adjunct faculty, "We're just handy dandy teaching tools." Although critical of the mismatch between their personal investment of time and the poor compensation in terms of pay or benefits, adjunct professors felt that their commitment to student learning was a totally separate issue. Use of CATs was unrelated to the conditions of adjunct employment. Many adjunct professors felt that they knew what they were getting into when they accepted their positions.

While CATs proved to be an effective tool for adjunct faculty within the classroom, they did not add to a community enterprise dedicated to understanding and improving student learning. Creating a knowledge base built on the fundamental aspects of teaching and learning appeared to be a very slow process; exchanges were not supplemented by a look at tangible documents or concrete experiences with CATs. While CATs were acknowledged as a fundamental "step" in looking at learning, there was uncertainty about how that could develop into dialogue and how to break through the firmly held tradition of teaching as an isolated activity. In addition, there was confusion about the meaning of the phrase "scholarship of teaching," since scholarship was still associated with research in one's field. However, adjunct faculty thought of a shared wisdom of practice as an avenue to specifically learn and master better teaching tips. Some were concerned that shared knowledge about teaching and learning would lead to set ways of effectively teaching, with one perspective dominating individual choices and decision making. Concrete sharing was one aspect of faculty development programs that needed to be expanded if a scholarship of teaching and learning were to be grounded in actual classroom experience. Always of concern was the feeling that the collective experience would lead to surveillance; no one wanted to be "put under a microscope."

Chapter Seven continues to investigate the use of CATs and encounters with others, as attempts are made to strengthen learning-centered colleges. Additional answers to the research questions are provided.

CHAPTER SEVEN

ENCOUNTERING OTHERS AND STRENGTHENING A LEARNING-CENTERED COLLEGE

Overview

A fundamental area of discussion with adjunct faculty participants and faculty development administrator participants was the extent to which formal settings, such as faculty development programs and activities, impacted on community college adjunct faculty use of CATs. Two recurring topics of conversation were the qualities that characterize a learning college and the place of adjunct professors in institutions that identify learning as central to their mission. Since the purpose of a learning college is to place learning first in every policy, program, and practice, the study revealed how the learning college concept had been translated into actions at one Vanguard and two non-Vanguard community colleges. The study also looked at the learning college as a place where individual contributions to learning are valued and recognized. A strong emerging theme centered on changing roles, alternative learning structures, and the relationship of these changes to the use of CATs.

Encountering others addressed the effectiveness of reaching out to adjunct professors through faculty development, responding to the accreditation process, feeling valued and included, strengthening a learning college, involving adjunct faculty as stakeholders, and using CATs within a learning college.

Reaching Out Through Faculty Development

Faculty Development played an important role in introducing CATs to adjunct professors. Broward Community College and Valencia Community College presented information on CATs at orientation, workshops, or special programs. Valencia's summer Destinations and on-line Scenarios programs paid special attention to CATs. AV summarized professors' comments: "Use of the CATs was mentioned more than any other factor in the faculty post-survey as a worthwhile element of the on-line course experience. Nearly all participants reported that a major change they will make in their teaching is to routinely employ CATs in their classrooms."

All faculty development administrator participants shared a desire to reach and communicate more on all topics related to teaching and learning through faculty development opportunities for adjunct professors. As chair for Development Day activities at Palm Beach Community College, AP said that "what we do has grown very broad; it's now for faculty and staff; we've made certain in the last year to invite adjuncts, to invite them through many types of contact. We don't have a lot of participation from our adjuncts, but they are invited." Later, she added, "Another piece of this is adjuncts sometimes work elsewhere or teach at other institutions, other community colleges, a university, or the K to 12 system, and for that reason they have difficulty attending our events. Adjunct pay for the day would certainly give them an incentive to attend." Both Broward Community College and Valencia Community College have experimented with a new approach to reaching adjunct faculty. AB at Broward Community College described the following:

> Dr. B on central campus started Teaching and Learning Forums last year. This was done by the department heads; on occasion during the year the faculty would set these things up. It could be at lunch on Wednesday from 12 to 1, where people talk about various academic interests. A social scientist faculty member organized something about globalization; a faculty member from the biology department organized something that related to that field. Department heads and faculty members generate the topics. Department heads are usually former faculty members, and most teach regularly. Adjuncts may come to more of these because they are related to the subject matter, and it is a smaller group.

Faculty development opportunities were perceived as "good learning experiences" by some adjunct faculty participants. Four of the adjunct faculty participants at Valencia had participated in the summer Destinations program. Two had attended for two summers; one participant was involved for four consecutive summers. The consensus was that the experience was valuable, and summertime provided a more relaxed schedule with time for reflection.

Yet, it was not uncommon to hear faculty development referred to as "a waste of time" by others. A few adjunct faculty participants did not know what types of opportunities existed at their colleges. General perceptions about faculty development were a barrier to extending conversations on CATs. CB said, "I don't know of any faculty development opportunities here; there may be, but I don't know about them." EB expressed disdain, as if faculty development and teaching have nothing in common:

> Faculty development is the greatest misnomer that has ever come down the pike. We have no idea of how to develop a faculty member except by requiring faculty to do certain things and to attend certain meetings. We come up with conditions and circumstances that we create that faculty have to meet. You have to have office hours; you have to post those office hours; you have to be on campus; you have to set a specific time; you have to have an e-mail address. The big thing this year is you must have the ability to go in on your e-mail and send one message to all of your students with one click. I am always available to my students, and that's what's most important. They know how to reach me many different ways, including e-mail. Why am I here? I'm not here to be included in something like faculty development. I'm here to teach.

Inconvenience was often cited as the reason for not participating in faculty development activities. BB commented, "It's the convenience factor, not the stipend." FB thought that lack of attendance by adjunct faculty was not a reflection of how interesting or "valuable" the activities were, but a sign of poor planning, "alternating faculty development offerings at night as opposed to just during the day would be a good idea." She later commented,

> The administration isn't a putting money or effort into anything like that—it all comes back to the visibility of the adjuncts. They extend us an invitation, but it's a moot point if they're having a workshop at 12 o'clock. . . . This way adjuncts aren't exposed to some of the new techniques and the new ways of doing things—so it becomes a self-sabotaging thing. So you have people who are knowledgeable in their content, but they can't teach.

FB speculated on the lack of a more concerted effort to reach adjunct professors; she wondered about the relationship between "their failure to reach us" and the general perception of adjunct faculty on their importance to their colleges.

> Maybe they're not worried about whether or not adjuncts know how to teach, so they have them come here to teach for a semester, and then they let them go. Then again lots of the adjuncts who come from high schools are already very familiar with issues relating to pedagogy. Maybe the college just hopes people get some of that training in other places.

CB, who was firmly committed to the importance of mastery of subject matter in effectively teaching math, said, "I anticipate most of it [faculty development] would be redundant; it's social—I don't know what relevance I would get out of it."

All adjunct faculty participants felt that an introduction to CATs, and on occasion a reintroduction to CATs, would be valuable. Combining CATs with other topics seemed more valuable than concentrating only on CATs. EV said, "Once you've used CATs, you want to see them in relation to other things." EP offered her advice, "No one asks me about topics I'd like to see covered. If they did, I'd say classroom management or assignments and projects that are interesting and appropriate. Relationships and bonding with students is another, with CATs as one example of that." CP thought that CATs and "things like multiple intelligences. And not just the theories related to this. We need practical information on teaching to multiple intelligences. We also need to learn to teach to this population, whoever is in front of us this semester."

Adjunct faculty participants in the disciplines of science and math, who often did not rely as often on CATs for feedback, were tentative about attending a Development Day workshop or orientation session that exclusively addressed CATs. CB said that he would prefer to "learn from an accomplished teacher" and described an activity that would be valuable to him:

> My recommendation for faculty development—the only thing that might be useful would be a videotape made of different people across the country teaching a class in which they say, here is a person who is going to lecture from a chapter from this book who we think presents this material in the best possible way. I would love to sit in and look at the videotape of someone having done that because then I could say maybe the techniques this guy is using would be beneficial to me teaching the same material. It could be related to a textbook, or related to a topic, or best practices—by somebody who is in a pure environment and someone who has done a masterful job.

As a math professor at another site, FP also wanted information on best practices, "New things are introduced on Development Days each year. They don't seem to have much relation to each other. I did enjoy a workshop on how to be a more effective teacher. We worked in three groups and came up with three types." BB said, "Faculty development is too generic. If they had a science speaker, I'd go."

Most often adjunct faculty participants preferred faculty development activities that related to their discipline but were not opposed to covering other topics. Several felt that a general overview of CATs and classroom research projects would benefit a wide audience. Others mentioned critical thinking; BP thought that absenteeism or academic dishonesty would be of interest. BP and BV were two adjunct professors who thought that faculty development was an avenue to concentrate on skills that overlap the disciplines. BV felt that faculty development should address basic English writing skills.

> My recommendation for faculty development is I would look at the college competencies and make sure we are getting to those, like the project I am working on to improve writing across all of the disciplines. So many professors say, "Well, I'm not an English teacher, and so it's not my job." Well, yeah, it is. If you're going to be a part of this college, and if your mission is make sure your students succeed and earn that degree, it is in fact your job to grade that paper effectively so that your students know that they did or did not communicate effectively. Be able to identify the basics of punctuation and grammar so that students can learn from their mistakes.

Sensitive to strong faculty ties to departments, AV envisioned a cross-disciplinary role for faculty development.

> In a word, yes, faculty are very focused on their disciplines. So, a lot of what I provide in faculty development is deliberately across the disciplines—how to get students to think and read and compute across disciplines. What we want the faculty member to do is translate that back to their particular discipline and their particular discipline needs. At the same time, we need to accommodate the desire to have specific discipline-based meetings, even if what we do in that meeting is about critically thinking generically. (AV)

Many adjunct faculty participants were critical of the focus on technology in faculty development programs. They felt that a feedback tool like CATs was overlooked in the wake of new technological advances that can speed up and simplify communication. This was perceived as a barrier to using CATs. DV said, "Just because we can communicate faster doesn't mean we communicate better. CATs have substance." EP concurred, "We don't want to be a culture that sends lots of meaningless messages; we want to send messages with meaning." While recognizing that "you have to keep up," there was a general feeling that computer workshops have drawn attention away from the more general topic of teaching and learning, shifting the emphasis from "high touch" to "high tech." EP said,

> Technology. They're making us technicians. Let's compare. How many workshops are there in Powerpoint, how many workshops in writing a good exam? Education is not the same as entertainment. Powerpoint can be so dry. My head goes down when I see them. I imagine the same thing happens to my students. It becomes just another pretty presentation.

Another adjunct faculty participant felt that some of the workshops moved too quickly or were too crowded. DB commented on one she attended:

> I recently went to one on computer-recorded grades. There were so many people. Few got it; there's a lot to learn, and it's very detailed. Hopefully, some day this will all be second nature to us, and we'll be able to concentrate on other more important things. But right now this is demanding a lot of our attention.

FP said,

> Now the emphasis is on Web pages; everyone must have one. It will probably be required by next year. But in my prep classes, one third of the students have no computer knowledge. I have computer illiterate students. And it's the older students who are the least computer savvy. Maybe we should think about this before we require faculty Web pages.

All of the faculty development administrator participants recognized the uncomfortable fit between life on campus as an adjunct professor and faculty development opportunities. Although 2% of the operating budget at each Florida community college during the time of this study was set aside for staff and programming development, adjunct faculty were not actively participating by and large. AP said that adjunct faculty attendance at Development Days was disappointing, but individuals did "reach out" to her for advice on problem situations, "Mostly they call with questions on students' Honor Projects. I also get calls from adjuncts who can't access course outlines from home. Other than that though, there is very little. The strongest link may be with the department chair." AP also explained the "pecking order" in signing up for workshops:

> At the Summer Institute, faculty are exposed to WebCT; the positions are only open to adjuncts after the openings have been offered to full-timers. If there is any space available, then adjuncts can come. Full-time faculty get release time for that; adjuncts do not get any pay. We depend on their personal incentive to do something like this. Without money, without time, adjuncts have a lot of constraints upon them.

AB commented that "for adjuncts, it's a unique story. We try to offer things that can accommodate their schedule." She explained the situation further:

> We offer things at night; we pay adjuncts to attend orientation. They go to one in August and an Adjunct Recognition Program in April. The pay is $50, which is not much for each adjunct, but it is substantial to my budget. This might provide the incentive to attend.

Many adjunct faculty participants recognized that the administration was attempting to reach them through as many communication methods as possible, but time limitations, plus little or no stipend, made attendance a chore. FB said,

> They're not purposefully isolating you. But unless opportunities are there—and they have to get the message to you that the opportunities are there—you stay isolated. There's great effort here to get the message out—through e-mail, in our mailboxes, notices tacked on the bulletin board. They go to great lengths to be sure everyone knows what's going on.

One of the avenues being pursued at Valencia is on-line faculty development. As a Vanguard college, Valencia often initiates change and "tests the water carefully." According to AV, "We know that change often means taking a few steps forward and then a step back; it's a learning process for us, too." To increase the chances for success, innovations often blend new ideas with traditional ones. Valencia's Scenerios moves in the direction of distance learning, but there is still a combination of personal interaction and independent work. DV commented on his experience:

> On-line doesn't function on its own; there are facilitators to keep the ball rolling. In Scenerios there is a face-to-face meeting with everyone initially. They explain how the process works. Then what a facilitator has to do is—two roles—one is to monitor and make sure everyone covers all the bases. The other role is to go in and get feedback from people. Those are the kinds of things that Valencia really gears into.

AV saw the potential in technology to meet the needs of adjunct faculty, especially through Scenerios, but he looked ahead to "on ground" innovations as well as "on-line."

> The Web provides a unique opportunity for adjunct faculty development. I'm not sure it's the best, but it's certainly one that we don't want to ignore. We simultaneously have a face-to-face adjunct effort going on this semester that is happening on all four campuses; it happened last year on just one campus as a pilot study. There will be a series of four face-to-face meetings at various times on various topics, held in the January semester. That will be with adjuncts. Some of the sessions will be run by full-time faculty. . . . One of the things that adjunct faculty have told us in focus groups, which is one of our efforts to get information from them, is that they want a greater connection to the college. Sometimes that is defined physically like in office space or phone numbers, but many times it's kind of a conversation with people who are teaching the same course full-time. They want conversation not just with other adjuncts but with other teachers in their course area.

AP also commented on the prospect of on-line faculty development for adjunct faculty:

> If a group of colleges worked to develop adjuncts collectively, that would be a big effort—that would be a very big effort. But it may be an important new way to reach out. Sometimes people say that investing money in adjunct activities is questionable; the investment may not benefit the school that provides it since some adjuncts are here today and gone tomorrow. Some people wonder if this is the best investment of time and money if an adjunct ends up teaching somewhere else. Have we benefited? What if they're not here tomorrow because there is no contract? The Web, I think, has possibilities. It would have to be very well done or else it will just be another Web site, contributing to information overload, with links that go to links that go to links. How information is presented is so important.

Some of the adjunct faculty participants went beyond traditional faculty development activities to pursue topics on their own that related to teaching and learning. The role of teacher as researcher was the foundation upon which use of CATs was built, and other projects became a continuation of this. A college environment that encouraged use of CATs also began to support these activities. All of the adjunct faculty participants at Valencia engaged in projects that can benefit student and teacher learning. EV was developing a CD with sign language vocabulary "to aid students with their retention." CV served Valencia as a design team member for developmental advising and became a mentor in the course offered to all new faculty, Teaching in Community Colleges. FV received a Connections, Title 3 Grant for professional and curriculum development. BV, who championed a cross disciplinary concern for writing skills, will be leading a Spring 2003 workshop, under Leadership Valencia, called "Meeting the College Goals and Competencies Through Assessment of International and Bilingual Student Writing." She also created a videotape for Intermediate Writing in which she interacted with students to produce an outline for an essay and to begin writing the first draft. DV was training to become a facilitator for an adjunct faculty development program, now in production, that Valencia plans to take nationwide. He had also been chosen, along with 10 other people, to be involved in a new project, soon to be field tested, to improve delivery of student services to prep students. DV also described the following:

> I'll tell you about another thing I have in the fire at Valencia. We always get these vocabulary books that I consider to be very, very lame, with a lot of random vocabulary. So what I'm putting together is my own vocabulary program. What I'm doing is I'm trying to get 40 or 50 words from each major content area. I want my kids to learn vocabulary so that when they walk into a humanities course, they know the basic words she is going to be talking about. When they walk into psychology, they know the basic words. Not just some words they may

> see somewhere else—I mean content-specific vocabulary, words wrapped around the disciplines. I talked to them [administrators] and said, "I want to do this." They said, "Put it together; we'll send it to the bookstore. We'll have them put it together for you, staple it for you, and we'll sell it for you in the bookstore." This is how they do things here. It's pretty cool. I must say they treat me exceedingly well here. I don't know if it's because I've been around so long everyone knows me or because I do a good job.

Although not designated a Vanguard college, Broward Community College also encourages its adjunct faculty to conduct Classroom Research. In a Proposal Guide, the Teaching and Learning Community clearly outlines the six steps to designing and conducting a study, which can be either quantitative or qualitative; the Guide urges widespread participation since "valuable studies can be conducted with simple designs and very modest data analysis procedures." As a researcher, the professor investigates a practice or problem with the intention of improving classroom teaching and learning. A written report is required for a Classroom Research Award. FB investigated the value of using film in her literature classes. Palm Beach Community College has moved in another direction; it strongly encourages faculty members to continue their education and attain advanced degrees. The college sends adjunct faculty information about masters and doctoral programs. An on-campus resource for professionals is the Elizabeth Bias Professional Library on the Lake Worth Campus, which contains materials for educational research; it serves the schools of Palm Beach County and the students and faculty of Palm Beach Community College. The library contains more than 6,000 books, a depository for ERIC documents, subscriptions to 200 journals, and access to databases on materials related to education.

Some of the adjunct faculty participants refused to limit themselves to activities on campus in order to better understand teaching and learning. Strong personal motivation led them to seek out other sources. FB believed that faculty development activities were generally scheduled at times that were inconvenient for adjunct faculty, but a committed professor, full-time or part-time, can seek out opportunities inside or outside the college environment.

> Faculty development activities are really more for full-time people because adjuncts don't hang around. There is no line between full-time and adjunct professionalism. If you want to be a part of the community, then just hang around. Participate. Go to the meetings. Go to the conferences. Find the resources that you need. It really is a question of personal motivation.

Similarly, CP found what she was looking for outside her college.

> I bring to community college teaching some of what I've learned in other places. I go once a month on Monday nights, for the whole year, to the Jewish Education Commission of Palm Beach County, paid for by Federation. I am paid to go, and I'm required to write an evaluation of what I've learned. The topics are wonderful—understanding multiple intelligences and ways of questioning, how to ask interesting questions. I have become a more effective teacher in many settings because of this.

In addition to their outlook on faculty development, adjunct faculty participants expressed their opinions about orientation at the start of the semester; the feedback was not complimentary at any of the sites. BB mentioned that orientation "isn't helpful, even for new adjuncts. Basically you're on your own, you're handed a textbook, maybe an old outline." Returning adjunct professors also considered orientation a waste of time, as evidenced by this sampling of statements: "I feel I'm required to go to orientation; it's something of a ritual. I don't really learn anything" (EP). "The all adjunct orientation is a waste. It's another way to make us feel that we're separate" (FP). "It's nice to see the people I know at orientation. But I can't think of anything I've learned there. It mostly feels like a pep rally in high school; sometimes there are things that are less peprallyist, maybe important things to know this semester" (BV). EB was the most confrontational:

> Sometimes I go to orientation, sometimes I don't. I've been asked to address the adjuncts on four different occasions. I've said the same thing all four times, "You're wasting your time; nobody wants you here; no one is going to give you the time of day. Unless you really have to teach—unless you have to teach—go find something else to do. You can find something that you will get paid for that will take less time." The administrators say to me, "You can't say that," and I say, "I just did." Those people who are just like me think, "I love to teach, and I love to teach because there something in me that makes it impossible for me not to teach"—these are the people I think I connect with. I think I'm reaching those people, at least I hope so.

Although it only casually came up in conversation, some adjunct faculty participants mentioned whether or not the president of their college or other top administrators attended adjunct faculty orientation. For these individuals, the appearance of the president was symbolic and was an indication of the value of adjunct faculty to the institution. BV said, "One nice thing—the president does come to greets us." FP described her experience:

> During orientation, the administrators poke in their heads. We have 20 minutes of introduction. For some of us who have been here many years, this is nice but not valuable. I mean I don't need this. The president doesn't appear at all, but he does go to full-time orientation. Now that says something. Several years ago, we had one meeting for everyone. I liked this. I saw my colleagues. I was part of the faculty. Only then did we split into departments.

BV recalled that Valencia did not have an orientation this fall; meetings by departments were held instead: "This is the first year we didn't have an orientation, and I don't know if it's because we started so quickly or so early. I didn't miss it."

Responding to the Accreditation Process

While adjunct faculty participants found that some of the formal, planned events, including orientation, fell short of what their colleges may have anticipated, the feeling among them was rarely more than annoyance or disappointment, not bitterness. Their harshest remarks were saved for SACs accreditation. Interestingly, the interview guides did not specifically ask about SACs, yet most of the adjunct professors shared comments about it with the researcher. Left out of the process, they felt distanced from their institutions during the SACs visit. EP said, "When SACs accreditation came, you'd think we were going for sainthood."

Consensus of opinion about the accreditation process was expressed in the following statements: "What good came out of it? Not even a bonding thing. Not a learning experience. It was an experience in bureaucracy." One adjunct faculty participant was not allowed to teach a particular course when accreditors came to visit, but was reinstated after their departure. FP described her experience:

> Things are incredibly uptight when SACS comes. I felt it myself. I have a master's degree, but I took a course called Special Topics in Math four times for credit. The course was different every time even though it had the same title. That was in 1972 and 1973; I couldn't go back and document that. Go find a syllabus from 30 years ago. So they were concerned how it would look to SACS. They said I was missing six credits. Since a BA is enough to teach prep classes, they shifted me over to those classes. Somehow, when SACS left in February, it was ok for me to teach credit classes again. Miraculously. They said, "We recounted, and you're fine."

Similarly frustrated by SACs review, FB said,

> Even as we speak, SACS is questioning a specific course because with the course I have 20 graduate credits and without it I have 17 and you need 18 to teach here—my boss is apoplectic already with them asking. . . . Every single time the credentials are checked for whatever the reason, that issue comes up. And the irony is that because of my humanities approach I bring BCC great accolades at all the conferences and with all my presentations, and in the classroom, and with my students. I've been chosen Adjunct Professor of the Year, and yet they still question that one credential.

One adjunct faculty participant voiced strong support for SACs procedures. BP said, "I agree with heavy scrutiny in certifying instructors. I don't take it as a personal affront. When I have the right credentials, these are the courses I can teach. It's as simple as that. This is not an adjunct issue; it affects full-time as well." AV strongly defended the consistency of his college in its decision making and its conduct before, during, and after the SACs visits:

> We're in the middle of it [the SACS accreditation process] right now. What I've found here is the compliance issues with SACS are very scrupulously adhered to. A decade ago we had some recommendations on credentialing, and since then the credentialing committee does a real thorough screening of who's credentialed to teach what. We err on the side of caution. It's not gearing up for this coming SACS; it's been ongoing for a decade. Dr. G has pretty much been entrusted with keeping track of this stuff, and the reviews are very thorough, to the point of being rigidly conservative. We had a guy who had been teaching government for decades who was moved out because he didn't have the right number of graduate credits; now he's teaching other courses. In my opinion he was a very capable Intro to Government teacher, but he, strictly speaking, didn't have the full number of credits to teach that course. . . . We follow the rules at all times. Take them to heart. The school considers it an ethical commitment to the rule. In practice I understand how it is—you have department chairs under pressure to cover courses, and these two things can easily bump up against each other.

Many of the adjunct faculty participants felt that administrators can "flip flop" and their loyalty and support of adjunct faculty is tested when outside pressure is exerted. FP felt that no matter how effectively she teaches, and no matter how well this is documented, any glitch on paper can jeopardize her position, "Administrators can act like puppets. Look at all the years I've taught; look at my student evaluations; look at my faculty evaluations. Under any kind of stress, they don't back us up." EB compared the roles played by administrators and teachers:

> The institution was created for educational purposes, not for administrative purposes. I understand that we have to have administration . . . but we can go out and hire anybody who has a good administrative background, and they can run

> the school. You can't just go out and pick up anybody and put them in a classroom and have them teach. So what's the most important job at this institution? It's not administration at either the college level or on this particular campus. The most important job could even be the caretaker. I don't know for sure, but it's not the administration. I think this is my personal prejudice—I think it's the classroom teacher.

Feeling Valued and Included

Adjunct faculty participants were asked to comment on the impact of their part-time status on their decisions relating to their teaching practices and use of CATs. Although most adjunct faculty participants felt personally motivated to use "whatever means necessary to reach my students," they did acknowledge that a "cold" or "disinterested" college environment made the classroom and the college seem like two distinct places. This was not a barrier to using CATs, but it was a barrier to conversations about teaching and learning.

Appreciation of adjunct faculty contribution at non-Vanguard community colleges was addressed at the interviews, resulting in the following comments. Positive statements reflected feelings of being "valued" or "backed up."

> Maybe I'm just generalizing based on my own experiences at a four-year school and a two-year school, but adjuncts are much more welcome at a two-year school. We aren't looked down on. I am invited to all meetings in my department. I am very involved in my department. As far as schoolwide, they have an adjunct recognition ceremony; it's a big event. A lot goes into this. . . . They are in constant communication with us. (DB)

> Two things. The support staff on this campus is fantastic. They do everything they can to help me. If I need an exam the last minute, it's done. No problem. No griping. The second is the enthusiasm on campus. The provost is seen on campus constantly. She is enthusiastic even at the end of the day. There's a genuine interest in me and what I'm doing. I can't help but respond to this kind of enthusiasm. (BP)

However, despite the good intentions of the administration, some of the adjunct faculty participants at non-Vanguard institutions were cynical about the way the colleges treated them. The most scathing comment came from EB: "If administrators could accomplish their purpose without teachers, they would do it. Teachers get in their way." Later, EB continued,

> The college does not support adjuncts any other way than with a paycheck. But, as far as I am concerned, it is all right if they stay out of my life. Just let me teach; that's all I want to do. If you want to pay me, fine; if you want me to do it for free, I'll do that. Their interference is unwelcome.

EP felt that the job of an adjunct professor is extremely insecure. "If they don't need you, you're eliminated." FB commented,

> They don't advocate for us to be recognized more as professionals—even when they count the numbers of years of experience you have as an adjunct, the years don't count. Fourteen years of teaching = 0. There should be some type of a schedule, some type of formula so if you become full-time you have a backlog of teaching experience. Otherwise your work as an adjunct is dismissed.

FP said,

> Sometimes adjuncts are grouped as "lesser" instructors because we have less hours and classes; we do not have all the resources available that full-timers have, such as an office where students can find us. We are given phone numbers and e-mail, but that's not the same. If a student wishes to talk privately, there's no place designated that an adjunct can go and take a student.

The following comments illustrate feelings that administrators can be indifferent to adjunct faculty:

> The administration is an entrenched hierarchy that is very political. They don't care about adjuncts. I could use all of the material in the teaching guide and leave the course right there, not adding anything of my own, and no one would say a word. If they hire competent people to teach, then they should have confidence in us. At the same time, motivate us to go back to school to learn new skills. Don't look in on us every once in a while to basically judge us; don't threaten us; challenge us to improve. (CP)

> The department head is required to sit in once on every class. But that doesn't happen. They're much too busy. They have too much to do of an administrative nature to be sitting in a classroom eavesdropping on a professor. I have had many department heads visit my class. "Hi. How're you? Things OK? Do you need anything? See you later." That's why the feedback for professors should always be from students. (EB)

> I don't blame the administrators. Most of the time they are just doing what they are told to do, following mandates set by state legislators. And those damn legislators know little about education. What they do know could hardly fill the bottom of a teacup. (BP)

Occasionally, one incident can foster a feeling that adjunct professors are second-rate faculty. FB told the story of her selection as Adjunct Professor of the Year:

> Adjuncts are invisible. They are an invisible force, and I tried to bring some visibility to them when I became Adjunct Professor of the Year. I joked with the dean about having my own parking spot. If the full-time Professor of the Year has a parking spot with their name on a plaque then I want the same available for the adjunct. We all agreed—why not for the adjunct professor? The sign would say Adjunct Professor of the Year 2000. Politically it's good. The students see it; the other adjuncts see it. Did that I get it? No. The promise was broken.

Some adjunct faculty participants noted the inconsistency in the treatment of part-time faculty. Sometimes the outlook of an associate dean or department chair "can make all the difference in the world." CP found that change was possible if the administrator in charge at the time wanted to make an effort to affect change. She commented,

> I don't have any contact with administrators. Last semester I was observed by a new department chair, and she gave me some good feedback. I also suggested to her the value of having my early and modern art history classes meet twice a week rather than once. She listened. The schedule was changed for fall, and my classes meet for two shorter segments rather than once a week for three hours. This shows things can happen if someone listens and then does something about it. If you couch it in terms—it will benefit the students—something usually happens. I've also suggested other books for the bookstore to carry for my students. No change there. If I want my students to read anything besides the required text used throughout the school, they [the students] have to get it on their own, through Amazon or something like that. Getting things like that to change is harder because money is involved.

Some adjunct faculty participants were aware that administrators were looking for ways to make adjunct faculty feel included and valued, but those efforts were only a starting point. EP remembered when the names of full-time faculty members were removed from the parking lot:

> Wow, suddenly we were all faculty and we could park anywhere. Nice, but where's the real recognition? Now they prefer to give us titles rather than money. Everyone is professor. These things are supposed to make us feel less like slave labor. We need some type of real recognition.

BB commented, "We now have an adjunct office; it's the size of a walk-in closet. If three of us are in there, it's full. If someone is tutoring a math student, it's very full. We all have one drawer. Is this considered recognition?" FB worked hard for some type of adjunct faculty recognition and felt she had succeeded when some of her travel expenses to conferences were covered by the college.

> I have changed policy at the school, and I'm very proud of that. Now if adjuncts are presenters at conferences some of their expenses will be covered. For nine years I have presented. The school has now begun to pay for the travel. They never pay for my hotel room; I always have to stay with a full-time colleague. But I had full-time colleagues supporting me, and I changed policy.

Responses at the Vanguard college were highly consistent. Some of the comments by Valencia's adjunct faculty participants referred to the "comfort level" at the school; they found that immediate concerns, such as class times or materials, were handled sensitively and quickly. FV said, "The administration is very sensitive to my needs as an adjunct. I'm very spoiled." CV commented, "We are treated well here. I am spoiled rotten." DV felt that even his personal concerns were not taken likely:

> It's amazing, like here, I'll give you an example: A couple of weeks ago they had already prepared the schedule for the spring, and I went and looked at it; I said, "Ms. C, is there any way you can move this class around? The way you guys scheduled it, this one class is going to make me miss dinner at home two nights a

> week. Can you help me out here? Is there any way it can be changed." She said, "Let's see what we can do." They found the room, and they changed the class time for me. It's absolutely amazing. They're very, very good to the adjuncts here.

Despite the variation in encounters among adjunct faculty participants and their students, other faculty, and administration, all recognized that professors who are rigid and refuse to accept the challenges of change cannot lead in the restructuring of teaching and learning. DP summarized this:

> I see Development Days and orientation as opportunities to attract teachers and introduce them to some new ideas, just like CATs. But teachers have to be willing to change the way they do things, no matter what the college has to offer, no matter what the college's attitude is or how they see your role or appreciate what you do. Those things can just be excuses. You have to want to teach in the best, most effective way possible. You have to want to do everything you can for your students to grasp what you're teaching. If sharing CATs is good for your students, do it. The teaching profession is the worst place for people who are not willing to change.

Strengthening a Learning College

To varying degrees, all of the adjunct faculty participants and faculty development administrator participants were familiar with the concept of the learning college, embracing the ideas that students should be "changed by the educational experience" and that learning goals must be attained and documented. All of the participants responded positively when asked whether their college was a learning college. Typical comments included the following: "It's important to talk about learning," or "Student learning is our primary focus," or "When our students are learning, that's when we're teaching." AV said,

> A learning college is place where learning is going on all the time, and everyone is involved in learning; they see it as their job. And, when something isn't

> working out, the framework for finding an answer is investigating it and learning from this experience—instead of who do I blame for it.

Several adjunct faculty participants remarked that community colleges are better examples of what is meant by a learning college than other higher education institutions. All were cognizant of the commitment of community colleges to teaching over research and publishing. Many commented that their students preferred the small class size at community colleges as compared to state universities. FP noticed that students responded to the attention paid to them, sometimes returning and taking courses at the community college after enrolling elsewhere: "I have students who transfer to the state university, but some come back to take calculus with me. They know the community college is the place to go with subjects that trouble you. Here you get help—we are famous for being helpful." DB added, "Students come to a community college for many reasons—often financial—they can finish two years at a great savings. For some it's a chance to turn over a new leaf after high school." FV felt that the term "learning college" applies to community colleges because they are not "weeding out" weaker students. "We are not like the bigger universities who have to thin their numbers out. They don't worry about learning communities or formative assessment. They simply separate the wheat from the chaff."

O'Banion's six principles of a learning college were much less familiar; therefore, participants' understanding of the foundation upon which the learning college was built was more general in nature. There were many references to the changed role of teacher as a facilitator of learning rather than a dispenser of knowledge. FV commented,

> The learning college isn't a fad. I hope not. Some view it as a coddling type of thing. Other teachers prefer the older way of looking at things; they think that

> they present a lecture or a reading assignment to students, and they [the students] just have to get it.

FB felt that the learning college perspective profoundly changed the teaching profession, and she remarked that she was "relieved" that she no longer had to be the all-knowing authority in the classroom and, "I can think of myself as a guide on the side, rather than the sage on the stage."

Noting this changed role of the professor in the learning paradigm, the faculty development administrator participants saw a close tie between CATs and the learning college concept; they were very impressed with CATs as a significant tool, which has "so many ways of benefiting teachers without the high cost." Adjunct faculty participants also linked the use of CATs with a college's goal of becoming learning-centered by strengthening the connections between teachers and students. CATs were referred to as "basic" to the learning college, gathering information on student learning and effective teaching by individual professors as they assume a researcher role. CATs were embraced as learning and communication tools that "fit in with what a learning college is trying to do" (DP), even if an individual professor chooses not to use them at any point. With a minimum investment of time, CATs were referred to by FB as a "remarkable tool if used thoughtfully by each individual."

Most adjunct faculty participants viewed the learning college concept as one that centers on students as learners; they were more hesitant about including others on staff as learners. EP said, "They can say whatever they want—it sounds very democratic, but are they really interested in what the woman serving pizza in the cafeteria is learning?" Several adjunct faculty participants were unsure about the implications of the following statement: “Everyone is a learner at a learning college.” EB referred to the concept as “nonsense.”

> Learning college—the public loves to hear things like that. These are marketing techniques that we use to keep the places that we work required places. We need to have our educational system. Why? Because it is a learning college. It’s a marketing tool. Why don’t we just do the job and turn out well-educated citizens? If we have taught our students to think, if we have taught our students to be inquisitive—to go and find out what the truth is—then we are educating them, and we don’t need fancy words to describe it. An educated person knows that everyone has the right to question. Don’t accept something as true just because it comes from a person with some authority—whether it’s a parent, preacher, dean, or whoever; don’t accept it just because they said it. Prove it! Satisfaction comes from always being unsatisfied, always looking for the truth. I’m constantly looking for answers. What happens when you have learned the last truth? It never happens. Life is constant questioning.

AV defended the learning college concept from nay sayers: “I get feedback that it is a faddish kind of a phrase; I really don’t feel that way about it. What could be more central to what we’re doing than to talk about and look at what students are learning?”

Envisioning professors themselves as learners was enthusiastically embraced by the adjunct faculty participants. With strong negative reaction to “teachers who remain stagnant,” as CP expressed it, there was a general feeling that professors need to challenge themselves to try new things in order to reach students more effectively. BV said, “My job is to see that students learn, to see that they succeed. Whatever changes I make, they have to positively affect my students.” Most adjunct faculty participants were quick to say that the effects of their own learning must be measured by student success. FP said, “It’s a learning college because student success is important here. I take this very personally. My students have less confidence in themselves, in math; they don’t know the subject, and I have to get them to ‘do that.’ I bolster them up.” She later commented, “Everybody is a counselor here. We have to listen to what our students have to say. We have an obligation to give them good advice. It's not the set of brains; it's the whole person—everything affects their learning." EP said,

> You can't call it a learning college if the teachers are convinced the students don't want to learn or who say, "I have the stupidest kids this term." Blaming the students is sheer laziness, or the teachers are totally blind. I think a learning college is a place where it is accepted that it is human nature to want to learn, and if learning isn't taking place then the school needs to change whatever it's doing.

The learning college concept was "not a big deal" to one adjunct faculty participant; that sentiment was echoed in the statements of others who said, "Why else would we be here except for learning" and "I wouldn't exactly call this a revolution like they do." In fact, the importance of student learning was such a strongly held belief that many of the adjunct faculty participants felt that that they would not be swayed by different practices at other colleges. Typical statements included the following: "I concentrate on my students when I'm in the classroom, and I bring what I know right along with me" and "I don't change what I think is important no matter where I am teaching." When asked if they would continue using CATs if they accepted a teaching position at an institution where CATs were not promoted, all adjunct faculty participants who now used CATs responded that they would. AV agreed,

> At the same time, it could make you a fish out of water—but making your arguments in terms of student learning would keep you safe. And CATs are directed at learning. I don't think there's anyone in our entire business with a disregard for what students are learning, so if you are able to talk about it, absent a certain kind of jargon, then you're fine. I don't think you will alienate your audience while talking about what students are learning. How can we get them to learn more? How do we know what they're really learning? Those kinds of questions don't depend on time or place, and they don't go out of date.

While the two non-Vanguard community colleges have absorbed the basic framework of the learning college concept, Valencia has moved to be consistently learning-centered with an unshakable focus on the subject of learning. Comments by the faculty development coordinator and all 5 adjunct faculty participants referred to the emphasis on learning in the college's mission statement, the ongoing training of faculty and staff, the free flow of conversations about teaching and learning, the regular use of assessment and documentation of learning goals, the expanding number of instructional delivery options for students, the attention to technology and its application to learning, the reallocation of resources, the increase in opportunities for collaboration, and the creation of a climate for learning. For example, becoming learning-centered runs through all school literature; this includes a Learning-Centered Reference Guide that explicitly spells out shared vocabulary to make communication clearer. Two key questions, posed by O'Banion, are highlighted: How will this activity improve and expand student learning? How will we know it? Therefore, decisions relating to instruction, assessment, policy, and college business are required to reflect the philosophical shift. Envisioning that changes within the organization should bear a relationship to each other, rather than remain as piecemeal efforts lacking unity, Valencia lists four Core Competencies in the Guide; they are "think, value, communicate, and act." These apply to faculty as well as students. Just as students are encouraged to expand their own capacities through the four competencies, professors in the Destinations program and Scenarios are not only introduced to CATs but are prompted to "act" upon them.

Involving Adjunct Faculty as Stakeholders

Some adjunct faculty participants voiced feelings that adjunct professors have to be included in a learning college or a college should not define itself this way. EP said, "If everyone is a learner, but we—and there are hundreds of us here—are an embarrassing presence and a reminder that things around here aren't that fair, and you'd rather not admit that we're even here, then don't go around talking about learning colleges." BP looked at this from a different perspective: "Yes, adjuncts are a part of what you call a learning college because of their commitment to teaching, just as committed as anyone else."

Faculty development administrator participants reassured the researcher that many attempts were being made to reach adjunct faculty, but all felt that more could be done. There was some frustration over the ability to involve more people; one faculty development administrator participant was concerned that the same professors were taking advantage of faculty development opportunities repeatedly. AB commented,

> Some people understand the concept of the learning college, and they go to conferences on the topic. The same thing happens here at the college. The people who go to the Teaching and Learning Community events are the ones who are already committed to it. Sometimes it seems like we're preaching to the choir.

A "champion for adjuncts" was a suggestion offered by several adjunct faculty participants as a means to build connections between adjunct professors and their colleges. It was also recommended that the role and the person who assumes that role remain reliable.

> Ms. J has been very involved with advocating for adjuncts' rights. I don't really see her as part of the "administration." She set up the celebration of adjuncts in the fall and in the spring. If you have a person who advocates for adjuncts, then things get done. If you don't have a person who advocates for adjuncts, then it doesn't get done. I don't know who they will get to replace her. It doesn't look like anybody right now. There isn't really firm institutional commitment to adjuncts. It just depends on who picks up the reins and commits time and energy to this type of project. (FB)

Feeling valued by her department and by the adjunct faculty advocate who gave her a "little push," FB put forth the effort to represent Broward Community College at several conferences. She described her experience:

> The English department at Broward is much more inclusive and generous and open towards an effort with adjuncts. I was embraced early on, and I was mentored to participate as if I was full-time. Ms. J [adjunct faculty advocate] really got after me to write up some of my teaching methods, and I've won several teaching grants, and I was Adjunct Professor of the Year. That's gratifying, very gratifying. I earned all the accolades. I've been more than just a drop-off adjunct.

Similarly, adjunct professors at Valencia responded like stakeholders in the institution through active participation in learning projects. BV said,

> The college looks at this as an opportunity to learn from us, too. We bring something to the table. In Destinations, as an example, we are given a task, and then it goes on-line. For one thing, we don't get paid unless it goes on-line, but it's always understood that the public nature of the project is part of this.

While describing her experiences in two Destinations programs, BV pointed to certificates of appreciation hanging in one corner of the adjunct faculty office. "They don't forget the details; they remember to do things like this, and it means a lot."

For other adjunct faculty participants, feelings of inclusion came from individual gestures, even small accommodations. For DV the personal treatment he received strengthened his bond with Valencia. He attributed 20 years of teaching as an adjunct professor at Valencia to "the way they treat me." He described how he, in turn, generated the same feelings in his classes:

> I think because the school does a great deal to make me feel included, I want to make sure my students feel included. Class dynamics are important. One of the things I do with my students, so you see I work hard to keep away from having a "cold" class, is they have to learn everybody's name. During the first test, I walk around and put my hand over someone's head and ask them to write down that person's name. I pick out six people and they have to name some names. It's just my way—they've got to feel included. They say, "What are we doing this for?"

> I say, "Because you're not going to walk out of here and not know anybody." That's one of the main thrusts of mine. What we're trying to do is to create a finished product here. And you're much more apt to hang around, whether you're a student or you're a faculty member, if you feel good about the place.

Adjunct faculty participants responded to feelings of inclusion by returning to the same college to teach year after year. Replying to the question—Why do you teach at this particular college?—most participants voiced feelings that they "belonged" there. A short commute from home was often the initial reason for seeking employment at a specific college; however, in subsequent semesters, several adjunct professors chose to work at other institutions farther from their homes, places where they felt more comfortable. For example, BP said,

> I travel quite a way to get to Palm Beach Community College, but I came here after teaching at a school that became unglued with problems. I'm very impressed with the support staff here. The people I need to turn to aren't sealed away.

Long distance traveling was an exception among the study's participants, but EV was willing to drive over 100 miles from her home to reach Valencia two days a week, and she also commuted between the east and west campuses on those days. EV mentioned that "long teaching histories are common at Valencia. . . . A learning college is helped by the consistency of the faculty working there, and many adjuncts have been here for years. A learning environment has to be a place you feel supported."

Many adjunct faculty participants felt that a learning college is one where every individual's contribution is recognized. DB stated,

> Absolutely, this is a learning college, because we are appreciated, because they always try to update us on your this and your that. There's lot of continuity here; a large number of adjuncts teach here for years. Absolutely, everyone is in the process of learning here—otherwise you go stale. I feel accepted here so I'm eager to learn. Maybe it's even more than acceptance; they've got a momentum going. I come on campus and I feel it.

While all voiced feelings that student response to their teaching was a priority, many adjunct faculty participants felt that it was important that the college address their contribution and make attempts to show them attention and express appreciation. The majority of adjunct faculty participants were keenly aware of when and how often they received recognition. It was mentioned many times during the interviews whether or not that attention came from top administrators. As one Valencia adjunct professor commented, "You know something is important when people give you their time. The real stuff comes from that. You can tell it's important to them when everybody comes and introduces themselves." Several of the adjunct faculty participants acknowledged the demanding role played by a college president, and, as BP said, "Let's face it, the president's responsibility is to get money and keep it coming." Yet, the participants acknowledged and respected outstanding leadership. There was a noteworthy comment about Valencia's president:

> The president's a fine person. He makes himself available to everyone here. And he's an interesting person—he plays music at Starbucks. He's in a folk band. He's a hoot. Here's something which has really helped adjuncts a lot—he's put a lot of pressure on the people who construct the schedules. He says, "You construct whatever class schedule you think you are going to need, but you aren't going to cancel anything that you advertise." What a difference this makes to students—and to adjuncts. As a result, we have a class running this term with six students in it. When is the last time you saw a class that small? He thinks about people, not just numbers or dollars. (DV)

All 3 faculty development administrator participants acknowledged that a learning college continually adapts to change. The extent to which their respective colleges anticipate change and plan ahead, not just react to change, was a key difference between Vanguard and non-Vanguard community colleges. AV commented, "We're not afraid of reshuffling the deck." In support of this, he mentioned funding changes. "We're undergoing a transition from mostly external grant funding to a lot of hard money being expended on faculty development. My position is new this year as it's being paid out of hard money. There is a greater commitment to this." Rethinking some of the traditional roles and structures of the learning college, AV also commented on the need for change due to the extension of teacher and student interaction over the Web. He looked ahead at the effect on adjunct faculty and the college's response:

> There will be increasing need for adjuncts to be related to the college because we are extending the electronic reach to everyone—all adjuncts have an e-mail address at Valencia. The ability for students to contact their professor has increased and when students learn how to do that and faculty learn how to manipulate that communication loop to get homework done, to get assignments turned in, we'll see a greater need for adjuncts to know how to balance the extra new time demand. It won't be just piecework, where one drives in, delivers something, and drives out. The interaction is going to get extended, and I think we're going to have to find a way to compensate that and to support it. Our president has said that we should think about steps in adjunct pay, about titles for long-term adjuncts who have demonstrated that they want to stay connected to the college and have gone through some faculty development work. There might be preconditions for a different rate of pay and perhaps different titles. There hasn't been action on this yet. But that type of thinking is important.

Two of the adjunct faculty participants at Valencia also mentioned changes in roles and structures at the college. CV and DV described a policy that affected course offerings each semester; CV said,

> The concept of a learning college is not something which is only an ideal, something that looks good on paper, but that's it. Although I have to admit that most bean counters aren't idealistic. But, I have worked at other community colleges, particularly one in North Carolina, where students were enrolled in prep classes, let's say, and if they didn't make progress it wasn't that important, as long as those heads were counted. The way Valencia tackles it is business sound. It is more sound to do it the right way, which also is the best way for the students. If you make the students' lives happier by teaching them the skills that they need in order to progress, that's good business because that's what your business is about. It is about educating the students. If you do everything towards educating

> them, your business is going to improve because word is going to get out that you have a high success rate. You have to follow through on what you're promising. The colleges that I've seen, and I've worked across the country, the ones like Valencia, which have high success rates, make sure they offer what the students need. It fiscally and idealistically makes sense. It's the right thing to do, and it pays off.

CV and DV mentioned changes in structure and scheduling, changes that were beneficial to students and alleviated a problem that had been particularly troubling to adjunct faculty. CV described this is in detail:

> They've capped the number of course offerings and the number of students who can sign into them. This means that the college can more efficiently figure out what they're doing, fewer last minute surprises. If they didn't cap it, they would never catch up as far as the ratios [of full-time to part-time] go. It's still open admissions; it's first come, first served. It's just a number that's capped. Other years that I taught here, the last minute they were creating all kinds of sections of a course, and they're not doing that now. This works for adjuncts. We now know what we're teaching each term. I know my courses are not going to be taken away because the college isn't just creating thousands of courses and letting students sign up, and if one course doesn't make enrollment then they give a full-timer my course, let's say. The schedule doesn't change last minute all the time. It is so beneficial to the adjuncts. That was one of the worst parts of being an adjunct, never knowing if you were going to get to teach the course you were offered or if it will be taken away from you—sometimes even after it started. That has all stopped.

Modifications like these reflect commitment to the "inventory" of learning colleges, with the selected Vanguard colleges serving as guides. The faculty development administrator participants and several of the adjunct faculty participants were aware of the designation of 12 community colleges as Vanguard colleges. The 2 faculty development administrator participants at the non-Vanguard community colleges were dedicated to the goals and mission statements of their schools. AB commented,

> Sometimes we ask ourselves—What are other community colleges doing? There are people who keep tabs on what is going on at the mover and shaker community colleges. I think we look outside ourselves, but we also take a closer look at what's going on inside.

Asked whether the Vanguard colleges were looked upon as "mentoring institutions," AV commented, "People look to us. There's some of that. At least six times a year, people come in to visit, to look at our student services and faculty development." He later added, "I would like to see us organize that better. I would like to have time away from our regular work flow—time to meet with people and talk to them about what's going on." In addition, Valencia will host the February 2003 meeting of the 12 Vanguard Learning Colleges. AV said, "We bring people together to talk about learning because learning is central to what we do." He was also quick to mention that the transformation has not been easy or smooth:

> On my good days I think we're on the cusp of being a really terrific school. On other days, a little step ahead is met with a step back. Stephen Brookfield refers to it like the road runner cartoon—running, then retreating, then falling, then getting on our feet again—a colorful way of talking about it. . . . A learning college is like an organism; it goes through childhood, adolescence. I think we're at a good stage here. We're young adults.

Asked whether the Vanguard colleges have enjoyed equal success or feel that they learn from each other, AV commented,

> We have a long way to go yet in many areas. I would like to be as far along as, let's say, Denver, where they boast there is no difference in the graduation rates among ethnic groups, and they get students through the remediation courses—so there's no difference if you enter needing remediation or not in terms of graduation. They've got some really terrific results. . . . Even among the Vanguards, there are differences.

Using CATs Within a Learning College

Most adjunct faculty participants recognized that an introduction to CATs, and occasional reintroductions to CATs, through faculty development programs, would be consistent with the learning college concept. It was generally felt that a valuable program and one that reaches out to adjunct faculty would support the mission statement of the college and would be "comprehensive and have some unity to it," as BP described it. The coherent sense of a learning college was lost when faculty development was described as "just a lot of things to do." Faculty development administrator participants also felt that that the more traditional approach to faculty development—teaching people how to teach—was interpreted as remedial work in the eyes of professors. AB said, "We're on a different footing with the emphasis on learning. We feel we're all in this together and no one is being judged." AV placed Valencia's professors in leadership roles as educational researchers who generate ideas, not just carry out ideas imposed upon them.

> For me to play Socrates with professional peers, pulling out of them what it is they know and how they know it and what's going on in their classrooms, irritates the hell of them. They feel it places me in a one-up position, and that's felt to be disrespectful. . . . So I have to come up with other ways to enter into that dialogue. When the conversation is about evidence that you've gathered from your classroom about student learning, and let's look at it together with an open mind, it's a different dynamic. There's a greater trust. . . . With faculty members, the simple Classroom Assessment Technique turns the corner for us, and it puts them in almost a researcher mode that's doable. They are able to look at things from their point of view as an English teacher or math teacher so they are able to bring their own discipline expertise to it. It's not the same as conversations about pedagogy because those can be intimidating and also tend to—for some reasons I haven't quite understood—convey disrespect. I try hard for the cuddly persona, but it can still come across as bossy and disrespectful. But when you think of what our learning activities for faculty consists of—go to your classes and ask them about something—then you very cleverly sidestep the problem, and you also bring it much closer to real classroom dynamic.

AV also commented on the important role that an understanding of the learning paradigm can play in hiring full-time faculty from the adjunct faculty pool:

> Out of the 78 full-time faculty recently hired, many came from the adjunct pool. Although it depends on the discipline. . . . As a ballpark figure, I'd say a third of those people were adjuncts, probably closer to half. We have a lot of faculty

> development available to adjuncts, and it gives them a leg up in talking about learning, demonstrating they know how to put together a good course syllabus, using CATs, and finding out if the students are learning or not. They're adept about certain issues—such as student diversity. And those are all hiring committee questions. How do you know your students are learning? And there are questions about diversity and technology—and we provide help for people in those areas. The hiring process has begun to reflect more and more the learning agenda. There is a question which people have to write on—something similar to, What is a learning college? or What is a professor's role in a learning college?

While all adjunct faculty participants described extending their own learning through both individual and group activities, the use of CATs was regarded as a solo learning experience. Comments by all participants in the study suggested that as a society we think more in terms of individual learning than collective learning. Several adjunct faculty participants did not preclude the idea of sharing CATs in a formal way in the future; a few voiced stronger feelings that "this is a possibility."

> Classroom Assessment Techniques are not just relevant to adjuncts; they're relevant to the teaching profession. CATs are both helpful and constructive so they need to introduce them to adjuncts, especially if they come on to this campus without college teaching experience. (DP)

> It was through the Teaching and Learning Community Classroom Research Project that I first learned about Classroom Assessment Techniques. It has always seemed important to me to create my own assessment tools. As part of my project, I did write them [CATs]. I think feedback from students on the effectiveness of your teaching is something that has enduring lasting value. You can always change the questionnaires—what shouldn't change is whether or not you use questionnaires, whether or not you use the tool. Even though I'm not doing a classroom research project this semester, I'm still using the written Classroom Assessment Techniques in my classrooms. The students tell me which works they liked, which works they didn't like. They talk about my teaching methods. They talk about my style. They talk about what was most beneficial to them personally, academically. And they can get very specific and, yes, I've learned a lot. (FB)

> CATs relate to the learning paradigm and the learning college concept because you hear the student voice. It makes the student reflect, and students are not always asked to reflect. (AV)

EP said, "The learning college won't be a product of what the administration does; it depends on teachers in the class with students in front of them. It's grass roots." Later, she reflected on the future:

> The younger generation is going to be less materialistic. They are choosing careers in education because they want to make a difference. Up till now, education has not been a priority. I think that is changing. With more and more truly dedicated teachers, student learning will improve. Administrators think success is measured in enrollment or numbers. They think they've hit the jackpot when SACS is over. The real success is still to come when we feel the results of the newly dedicated group of teachers.

Chapter Seven Conclusions

Moving outward to encounters with others in more structured and formal settings, such as faculty development programs and activities, revealed the meaning that CATs had for adjunct faculty within the broad context of the institution itself. New barriers and facilitators for using CATs surfaced, and, at this level of inquiry, experiences with CATs were considered for their potential contribution to a collective understanding of teaching and learning. Interviews with participants provided insight into the effect of faculty development programs on the use of CATs by community college adjunct faculty and the effect of a Vanguard Learning College versus non-Vanguard community colleges on the use of CATs.

Data from the study showed that faculty development programs played an important role in introducing CATs to adjunct faculty who were unfamiliar with them; professors who found CATs to be a useful tool continued to use them at other institutions, even if CATs were not promoted there. At Broward Community College, CATs were introduced on occasion, but there was modest follow-up or feedback on their use; a greater emphasis was placed on classroom research projects, which often incorporated CATs, and the findings of these studies were made public. Adjunct faculty at Palm Beach Community College did not learn about CATs through the faculty development program at their college, but CATs were frequently designed by adjunct professors already familiar with them; the faculty development administrator at the college saw the value of CATs to 4MAT, a system of instructional design that the college actively promoted. Adjunct faculty at Valencia Community College learned about CATs through a variety of activities, and the research foundation for CATs received strong emphasis with frequent citations from the Angelo and Cross handbook.

Faculty development activities, particularly orientation, were criticized by adjunct faculty for a variety of reasons. First, adjunct professors found the time and place of faculty development offerings to be inconvenient; reactions to this varied from frustration to relief. In response, adjunct faculty learned to be resourceful and found answers to their questions by contacting a faculty development administrator at their own convenience or seeking advice from a department chair. Second, adjunct faculty preferred activities that were strongly related to their discipline. While there was agreement that there are professors who are knowledgeable in their subject matter but teach ineffectively, adjunct faculty strongly supported the position that professors cannot be weak in their subject matter and teach effectively. Therefore, it was suggested that CATs be introduced in relation to the disciplines and learning goals unique to each discipline. Third, adjunct faculty voiced concern over the overemphasis on workshops related to technology. The emphasis on "high tech" over "high touch" was perceived as a barrier to using CATs. It was felt that an introduction to CATs, and occasionally a reintroduction to CATs, would be beneficial as one way to focus on what was really important—communicating better, not just faster. Valencia Community College uniquely overcame this barrier by supplying a connection between the two; they blended high tech and high touch through Scenarios, on-line faculty development that began with face-to-face meetings of participating faculty, followed by the use of trained facilitators to monitor the on-line portion of the program. Therefore, on-line and on-ground interactions complemented each other.

Valencia Community College had a firm commitment to introducing CATs to adjunct professors through faculty development programs, including Scenarios and the summer Destinations program. In the former, on-line exchanges on CATs and specific experiences using them had begun. Avenues for adjunct faculty to learn about CATs were provided; participation was encouraged; programs were monitored; responses were solicited. At Valencia, CATs were regarded as a vital and indispensable formative assessment tool. The four competencies stressed in their Learning-Centered Reference Guide—think, value, communicate, act—were applied to the use of CATs. Adjunct professors who were introduced to CATs acted upon them, plus there was follow-up and feedback. At Valencia, innovations were thought through before fuller implementation by "testing the waters carefully."

Interviews with adjunct faculty at all three sites also gravitated toward issues that impacted on dialogue about teaching and learning, including CATs. First, the SACS accreditation process was dismissed by some adjunct faculty as an "experience in bureaucracy," which led to inconsistent treatment of adjunct faculty before, during, and after the SACS visit. These adjunct professors felt a "flip flop" in the loyalty of the administration toward them. Second, some adjunct faculty felt distant and excluded from the life of the college. The classroom environment and the college itself felt like two distinct places. A cold, disinterested environment contributed to the sense that teaching was an isolated activity. Third, adjunct faculty believed that "real recognition" was important and would contribute to dialogue on teaching and learning. Although they could not agree on what the nature of real recognition would be, adjunct faculty participants felt that the gesture would symbolize value to the institution. This was already underway at Valencia Community College where all of the participating adjunct professors felt recognized and valued; they even felt "spoiled." The adjunct faculty at all three sites who enjoyed a sense of "belonging" were eager to return year after year, leading to long teaching histories. Most of the adjunct faculty participants agreed that the feeling "my college backs me up" would be critically important to extending dialogue on teaching and learning outside the classroom, and growth as a learning college would be helped by the loyalty and consistent teaching histories of the professors working there.

The Vanguard Learning College and non-Vanguard community colleges in the study, therefore, shared a similarity of ideas. All participating colleges were perceived by faculty development administrators and adjunct faculty to be dedicated to learning, despite variations in the definitions of the term "learning college" and an overall lack of familiarity with O'Banion's six principles. The learning college concept was generally not considered a fad or a "coddling type of thing." It was often expressed that learning colleges continually adapt to change; they anticipate change, plan ahead, and are "not afraid of reshuffling the deck." The following ideas had support of the study's participants: a teacher is not a "finished product;" teachers are learners; and all contributions to a learning college must be recognized. In addition, administrators saw the tie between CATs and a learning college, recognizing both the ample benefits of the techniques without the high cost. Referred to as "basic" to a learning college, CATs had value as tools to gather information on student learning with minimum effort. There was strong negative reaction by all participants in the study to professors who remained stagnant. A learning college was seen as an opportunity for individual growth by professors fully committed to student success.

The Vanguard Learning College distinguished itself from the non-Vanguard community colleges in the study by the actions taken on the path to becoming learning-centered. At Valencia Community College, the word "learning" ran through all literature, and shared vocabulary made communication clearer; roles and structures were being "reshuffled" to benefit students and faculty; a wide variety of well-publicized faculty development opportunities were offered for adjunct faculty at convenient times or on-line, usually with stipends; adjunct professors assumed a leadership role as educational researchers who generated ideas and pursued independent projects to improve student learning; adjunct faculty were introduced to CATs and then prompted to learn, act, and reflect upon the experience of using them in the classroom through on-line discussion; there was consistency of response to adjunct faculty, even to their personal concerns, by the college administration; adjunct professors maintained strong ties with the college, and long term retention of adjunct faculty was typical; and Valencia often hired full-time professors from the adjunct faculty pool, especially those who had participated in faculty development activities.

The administrator participants at Broward Community College and Palm Beach Community College felt that the 12 Vanguard Learning Colleges served as guides, but they also recalled that other colleges, which were once considered leaders, no longer had that distinction. As a result, they preferred to look "outside" for new ideas but remain focused on what goes on "inside," paying close attention to their unique situations and concerns.

Chapter Eight summarizes the study, states the conclusions, discusses the study's findings, and makes recommendations for practice and further study.

CHAPTER EIGHT

SUMMARY,
CONCLUSIONS,
DISCUSSION OF FINDINGS,
RECOMMENDATIONS FOR PRACTICE,
RECOMMENDATIONS FOR FURTHER STUDY

Summary

This study investigated community college adjunct faculty use of Classroom Assessment Techniques (CATs) and the meaning that the phenomenon, the experience of using CATs in the classroom, had for them. It is a timely study as community colleges increasingly commit to the goal of becoming learning-centered and evidence of their dedication to that purpose continues to surface. Research on a specific adjunct faculty teaching experience is a step toward understanding the absorption of the learning college concept at all levels of an institution and its expansion into actual practice. Concern for student learning and for documentation of student learning goals, which are both at the heart of the learning college concept, includes a search for ways in which community college adjunct faculty can become effective learning facilitators, participate in public dialogue on teaching and learning, and add to the scholarship of teaching. Leadership in reforming higher education depends on input from all professors. In this way, community college adjunct professors, who comprise approximately 60% of the faculty, become valued contributors to a learning college. Three conclusions are presented:

(a) Adjunct faculty use CATs to expand their own learning; (b) Deprivatizing adjunct faculty teaching is difficult: Collective enterprise meets with resistance; and (c) CATs strengthen learning-centered colleges.

Conclusions

Adjunct Faculty Use CATs to Expand Their Own Learning

CATs are simple yet significant tools that give community college adjunct faculty trustworthy feedback. CATs are high value, yet low cost. Adjunct professors can design their own questionnaires and use them to meet a variety of needs; professors who adopt CATs know that these techniques are easily "adapted" to a specific set of circumstances. The variety of approaches to using CATs and the meaning that CATs had for adjunct faculty participants in the study are testimony to their versatility.

The experience of teaching as an adjunct professor and using CATs in the classroom is unique for each professor. The meaning derived from that experience is a reflection of what the individual hopes to learn. Genuine concerns generate probing questions. At the same time, CATs may shed light on issues that are of interest to students, problems that a professor is unaware of and may not have anticipated. Therefore, key personal qualities impact on use of CATs: honesty with oneself and the desire to communicate honestly with students as well, resoluteness to continually improve, and willingness to change. Adjunct faculty who perceive of themselves as "expandable selves" find unexpected results to be opportunities for learning.

There are many barriers which can inhibit use of CATs by adjunct faculty: concern for allocation of classroom time, lack of familiarity with the wide range of CATs available, preference for more traditional assessment tools in courses with specific learning goals, avoidance of "self-imposed" risk taking, resistance to opening up the "guarded" or traditionally private classroom, fear of being judged, sensitivity to feedback, allegiance to the instructional paradigm, impatience with what is perceived to be students' lack of motivation to learn, wariness that there is a tendency for CATs to become a forum to complain about course work, and dismissal of CATs as tools which reap redundant information. The barriers are generally overcome through recognition that CATs inform professors of individual student concerns; the feedback is well worth the time and energy invested.

Many facilitators promote use of CATs: recognition of the "uncomplicated" nature of CATs, appreciation of the flexibility and value of CATs to strengthen communication between professors and students and reduce the "me versus you" feeling, acknowledgment that CATs provide more immediate feedback that can be acted upon than end-of-term student evaluations, strong personal motivation to improve teaching effectiveness, love of teaching, readiness to be receptive to student feedback, eagerness to assume the role of teacher as researcher, vision of the classroom as a place where students and professors work together to reach goals, desire to communicate openly with the diversity of students at community colleges and to develop students' critical thinking skills, interest in the effectiveness of new instructional methods, and a commitment to building students' confidence as learners.

Adjunct faculty show deep concern for student learning, and their insights into classroom experiences are valuable. Knowledgeable in their areas of expertise, adjunct professors bring a fresh perspective to the subject of teaching and learning. According to faculty development administrator participants in the study, adjunct faculty are attentive and eager to revitalize their teaching. According to the adjunct faculty participants, working conditions are not a barrier to using CATs. The terms of adjunct faculty employment are not to be confused with what happens in their classrooms. As researchers, adjunct professors are eager to assume leadership roles in the restructuring of teaching and learning when an institution encourages their participation.

Institutional commitment to CATs and introduction to CATs as formative assessment with a solid research base are important steps toward encouraging their use. Faculty development programs reveal the extent to which the learning paradigm has been embraced by moving away from a top-down "this is how you teach" to a grassroots "this is what our instructors have learned." A focus on CATs also balances the attention given to technology and computers. CATs are a reminder that "high touch" faculty development activities must complement those that are "high tech."

Faculty development programs that are non-judgmental entice adjunct faculty participation. Comments by adjunct faculty participants indicate that mandatory CATs would meet with resistance and conflict with a focus on commitment, not compliance. Attempts to foster growth rest on a foundation of personal choice. Also, it is not enough to plan activities and accept or overlook lack of attendance by adjunct faculty. Strategies to involve part-time professors have not been exhausted. On-line activities complemented by on-ground meetings are avenues to be pursued. The reward system and the hiring process must be aligned with personal initiative to continually improve.

CATs are concrete, simple communication tools that tap into real classroom experiences. CATs help narrow the gap between professors' perceptions of students and the reality; they are a starting point for assessment for improvement. They lead to reflection by individual adjunct professors on teaching practices and are instrumental in decisions about course design, instructional methods, and summative assessments. CATs are a first step toward researching the connection between what is taught and what is learned.

Deprivatizing Adjunct Faculty Teaching Is Difficult: Collective Enterprise Meets with Resistance

The interviews of adjunct faculty participants revealed that teaching remains an isolated activity, even in colleges that endeavor to be learning-centered. Maintaining the privacy of the teaching experience is tenaciously held onto by adjunct faculty. This does not preclude receptiveness to new ideas with the individual professor serving as a filter. Adjunct professors enjoy sampling information presented to them and experimenting with it in their own classrooms. Resistance is strong toward ideas that are imposed upon them. "Push too hard and the suggestion is doomed," said one administrator. Therefore, professors benefit individually by the emphasis on learning at their respective colleges; all adjunct faculty participants in the study voiced strong personal motivation to improve teaching effectiveness through their own resourcefulness. At the same time, this tradition of privacy poses a strong barrier to moving toward public dialogue on the meaning that the experience of using CATs has for adjunct faculty. There is a definite rift between personal and collective advantages of a learning college; the division between the two is evident in the resistance to sharing. As explained by one adjunct faculty participant, a body of knowledge on teaching can become "the right way to do things, and then the only way to do things." However, carefully implemented activities that are extended to adjunct professors, but not imposed upon them, can begin the progression toward a shared venture in learning and a collective scholarship of teaching. According to Weimer (2001), descriptions of good practice grow into a body of knowledge or "wisdom of practice"; this collective experience then becomes the backdrop for informed practice by individual professors. Likewise, Cross (1995) envisions an intellectual community of faculty actively engaged in the development of their profession on every college campus as a way to meet the demand for student learning and the demonstration of that learning.

All three participant sites are committed to improved teaching and increased student learning, although the avenues to reach these goals vary. The strategies used include training in 4MAT at Palm Beach Community College, and participation in Teaching and Learning Forums and Classroom Research Projects conducted under the auspices of the Teaching Learning Community at Broward Community College. Individual and communal learning are fusing together in a unique way at Valencia Community College. Valencia's distinct approach taps into personal motivation: Adjunct faculty investigation of student learning in the classroom through individually designed projects, generated by the professors themselves and encouraged by the college, provides a basic source of support for scholarship that revolves around teaching. Placing adjunct professors in a leadership role, as educational researchers who put forward ideas stimulated by actual classroom experiences and concerns, is consistent with the inventory of a learning-centered college. In addition, what is researched individually and independently begins to grow into a foundation for collective investigation. Conversations about evidence gathered in classrooms, regarding student learning, is looked at together with an open mind. Valencia's faculty development administrator explained, "It's a different dynamic."

CATs Strengthen Learning-Centered Colleges

CATs are communication tools that strengthen the tie between a professor and an individual student; they are fundamental in a learning college. At all three participating sites, CATs are used selectively by adjunct faculty for the benefit of student learning. CATs are slowly being used to their fullest advantage. As a Vanguard Learning College, Valencia Community College explores new territory and goes beyond what has traditionally been done. Commitment to learning is a visible priority, and new projects pivot around this unifying principle. The research foundation for CATs is explained to adjunct faculty, and use of CATs is gradually becoming a part of conversations on teaching and learning in which professors provide and discuss concrete evidence from classroom experiences. In this way, a learning college develops into more than a collection of professors. Individualized practices and decisions relating to instruction are respected, yet sharing of teaching and learning experiences builds a vital source of accessible information. A learning college becomes a resource to which professors can contribute and upon which they can depend over time. In contrast, the tradition of the guarded classroom blocks sharing and limits learning. There is strong agreement that deprivatizing teaching practices by "yanking open" classrooms meets with resistance. Instead, it is important to create an environment in which the scholarship of teaching is encouraged. This pulls rather than pushes professors out onto the "front porch." This environment includes and values the contribution of all its members. Adjunct faculty need to believe that they matter greatly to their students, to colleagues, to the administration, and to the teaching and learning process. The roles and structures of the college reinforce this through consistency of treatment at all times. A learning college is an empowering environment in which each individual's commitment to learning is critical.

A learning college meets the needs of its students by building shared trust and motivation to work toward the goal of student learning. Within this setting, contextual research, often beginning with CATs, looks at teaching practices that critically impact on learning. CATs become instrumental in classroom research, which explores hypotheses and traditional beliefs about the connections between teachers and students. CATs do not lead to one teaching model that can predict success; CATs begin the process of looking for insights into learning, drawn from a specific classroom setting, with a specific group of students, through a specific method of instruction. Contextual research makes the classroom learning experience the most important point of reference. The public sharing of what is learned from CATs creates possibilities to try new approaches. Rather than creating rules for teaching, contextual research creates opportunities for learning. The isolation of teaching is reduced by conversation about CATs, yet the independence of the teaching experience is maintained.

Learning colleges depend on both individual and collective enterprise. An environment where there is shared learning and trust empowers individuals, creating a community of "expandable selves."

Discussion of Findings

In Chapter Two of this dissertation, the researcher presented a review of the related literature concerning adjunct faculty at community colleges, Classroom Assessment Techniques, the reform movement and assessment for improvement, scholarship of teaching, faculty development programs at community colleges, and the learning college concept and contextual research. As a result of the study conducted at Valencia Community College, Broward Community College, and Palm Beach Community College, comparisons can be made among the answers to the five research questions and the results of previous research. There are several ways in which this study confirms, as well as contradicts, other findings and conclusions.

This study confirms earlier research on the barriers and facilitators affecting the basic use of CATs (encounters with the task), personal choices and "self-imposed" risk taking when using CATs (encounters with oneself), and communication with students, other faculty, and administration (encounters with others). First, Cuevas' study (1991) looks at barriers to using CATs; setting aside time for classroom research inhibits faculty involvement; similarly, in this study, dedicating class time to CATs is a barrier to use of the techniques by adjunct faculty. Second, previous research shows that CATs do change the way professors teach, and they affect the relationship between teachers and students. The Eisenbach et al. study (1998) found that CATs contribute to reflections by teachers, faculty need self-confidence to face negative feedback, and faculty must feel ready to use CATs. The present study also confirms findings by Steadman (1994), who found that professors use specific CATs to match their own purposes, whether it is to obtain feedback on the effectiveness of their teaching, to monitor student learning, or to improve communication and congenial interaction. Steadman's study recommends that faculty capitalize on the potential of CATs to help students learn how to learn. Steadman's recommendation is substantiated in this study; CATs were used at the three participating colleges largely for content-related assessment or learner reaction to instruction or to the learning environment. CATs were not used to their optimum to help with student study habits, attitudes, values, or self-awareness.

Unlike Kelly (1993), who finds that community college faculty take a greater interest in their teaching after exposure to CATs, the present study reveals that interest in teaching effectively is already in place and that CATs are used by those who seek feedback and are willing to make changes if necessary. Adjunct faculty participants started the "rethinking" process before use of CATs, and personal motivation to teach as effectively as possible was the strongest facilitator for using the techniques.

While this study does not look at attitudinal change before and after exposure to CATs in a faculty development program, it does resemble Gaeddert's (2001) research in its qualitative methodology. Gaeddert finds that professors judge CATs to be a valuable tool, well worth the investment of time. The present study similarly reveals that the time barrier is overcome by the valuable insights that result from CATs; these insights actually save time by eliminating unnecessary review of material with which students are comfortable and focusing on student feedback on "trouble spots."

This study also confirms one of the conclusions reached by Angelo and Cross (1993), who recognize that teaching goals differ from one another in the academic disciplines. Attention is drawn to the variety of strategies for selecting CATs based on discipline. However, disciplinary differences emerge as strong barriers in the present study. For several of the adjunct faculty participants, decisions relating to use of CATs were linked to the learning goals connected with a particular course. In some instances, the pressure to reach specific goals set by a department discouraged use of assessment methods other than quizzes, exams, and papers. In addition, this study does not confirm a second conclusion by Angelo and Cross. They believe that classroom assessment naturally grows into a social, collaborative learning experience that teachers like to share. The adjunct faculty in the present study shared their overall enthusiasm for CATs and their insights gained from CATs on rare occasions, usually with full-time faculty. Most adjunct faculty participants, however, did not feel comfortable making actual documents public and accessible. Use of CATs remained a private enterprise.

This study also contradicts the finding by Rose (1992) that misperceptions between full-time and part-time faculty are largely due to the lack of interaction between the two groups. Adjunct faculty participants at Valencia Community College, Broward Community College, and Palm Beach Community College generally voiced strong connections with full-time faculty.

The literature also provides background for an answer to the third research question surrounding dialogue on teaching and learning and the scholarship of teaching. The present study confirms one of the obstacles that Weimer (2001) believes is an impasse to the development of a knowledge base related to teaching and learning. Adjunct faculty participants did lack of a sense of professional obligation to record or pass along to other professors what they had learned from actual classroom experiences. Correspondingly, scholarship of teaching was a term without a definition that adjunct faculty participants could agree upon; an understanding of what was meant by scholarship of teaching was often quite vague.

Yet, some participants in the present study were beginning to view scholarship at a community college as active inquiry into teaching and learning. The literature suggests avenues, not yet explored, that have great potential to direct that inquiry. When Weimer (2001) states the problems of building a wisdom of practice, she mentions two key areas that may help provide solutions. These are areas in which adjunct professors can contribute valuable information. First, adjunct faculty have the capacity to recommend topics for educational research that are relevant to today's classrooms. All too often, according to Weimer (2001), educational researchers end up asking questions that "are not particularly relevant or of much interest to classroom practitioners" (p. 49). Second, adjunct faculty can help to illuminate what Weimer calls the "peculiarities of fit." She writes, "there is seldom any sense of why some strategies, policies, practices, ideas, techniques, and approaches work in some contexts and not in others" (p. 49). The fresh perspective of adjunct professors can help to answer some of the "how" and "why" questions of what works and what fails in a specific classroom setting.

The literature addresses the difference between the "how" and "why" questions of classroom research and the more basic "what" questions of CATs and classroom assessment. Paulsen (2001) describes how Angelo and Cross, who initially make no distinction between classroom assessment and classroom research, eventually reconceptualize them as two activities. Paulsen reveals that classroom assessment may not meet the criteria of the scholarship of teaching because it is less systematic and does not move from gathering evidence, to interpreting data, to sharing results publicly. In contrast, classroom research moves through a structured process and meets the criteria. The present study confirms that classroom assessment and CATs are used by adjunct faculty to investigate concerns that have arisen in a particular setting and do not meet rigorous research methodology. But, the study does suggest that CATs start the process and can inspire in-depth inquiries in the future. The present study indicates that CATs have potential to generate dialogue on teaching and learning, yet may not, by themselves, contribute to the scholarship of teaching. They motivate adjunct professors to pursue classroom research projects as a next step if there is institutional support.

The literature candidly portrays the difficulties of moving both professors and institutions in new directions. The present study reveals that taking stock of the "inventory" of a learning college, as O'Banion (2000) suggests, takes considerable time. Echoing Smith's (2001) concerns, what is known about teaching remains a baffling, unsorted mix of ideas. The continuum of growth toward a scholarship of teaching that Weston and McAlpine (2001) envision has only reached phase one—personal investigation—without advancing to phase two, public exchange, or phase three, a comprehensive body of knowledge published or presented in some way to inform others.

The present study furthers research on the changing, fluid definition of the terms scholarship and scholarship of teaching. Kelly-Kleese (2001) contributes to the image of a community college as a scholarly place, where scholarship may not fit the traditional definition of discovery, research, or published writings in the disciplines, but instead may better be described as scholarly discourse. This level of conversation is valued for its ability to improve teaching and learning at an institution. Kelly-Kleese opens the door to an investigation of the nature of the scholarship of teaching. The present study is partially a response to her recommendation for more qualitative studies on community college scholarship, including adjunct faculty contribution, as part of an ongoing process involving communication and dialogue. Interviews with 15 adjunct professors revealed that CATs rarely lead to dialogue on teaching and learning, and the actual documents are highly personal and not open to public scrutiny. New developments, experimenting with on-line communication, have the potential to move adjunct faculty in the direction of a scholarship of teaching

The present study confirms the findings in previous investigations of faculty development. The literature review shows that programs vary considerably from one community college to another (Roueche et al., 1995), and the expectations of faculty development programs are not being met (Miller, 1997). Adjunct faculty participants from Valencia Community College, Broward Community College, and Palm Beach Community College often struggled to attend planned events; strong motivation to grow personally and professionally was the key to attendance, and programs that seemed in any way "punitive" met with strong resistance. The present study confirms the potential for success using specific strategies. For example, O'Banion et al. (1994) advise programs to offer a range of extrinsic and intrinsic motivators because of the investment of time and energy required of professors. Recognition for participation in faculty development activities, which Cross (1990) advises, is a part of Valencia's program. Stipends, plus certificates honoring program completion, are considered valuable rewards by adjunct faculty. Valencia also considers participation in faculty development programs as one of its criteria for hiring full-time faculty from the adjunct faculty population.

Previous studies on faculty development for adjunct professors concentrate on the nature of the programs, and verify the low turnout among part-time faculty. A study by Ellis (1990) reveals that administrators are more committed than the part-time instructors themselves to the need for faculty development. Many of the adjunct faculty participants in the present study responded in a similar lackluster way to faculty development opportunities, despite administrators' enthusiasm. However, it is a powerful finding that an introduction to CATs at any institution carries over into use at other colleges. An effective tool or technique introduced through faculty development can have long-lasting effect and value if an individual professor incorporates it as part of classroom routine. Valent's (1992) study finds that quality staff development opens up communication and addresses the needs and concerns of adjunct faculty stakeholders. Congruence between the perceived staff development needs of part-timers and those who organize the activities is critical. The present study also confirms findings by Davis (1995): Individual readiness to change is critical for a shift to the learning paradigm. Readiness is a key to adjunct faculty response.

Research on the learning college is quite recent. Strategies used to create learning-centered colleges are the topic of Robles' (1999) study of California community colleges. The findings are grouped according to Senge's five learning disciplines, which are at the core of learning organizations. The present study confirms Robles' finding that community colleges are excellent "incubators" for personal mastery. It also confirms that the learning needs of the organization itself must be met, and professional development should be an integral part of institutional planning. All of these eventually impact on student learning. The present study also confirms a finding by Teahen (2000): Growth at a learning-centered college relies heavily on process and goes through phases. An empowering, humane environment is an important dimension in becoming learning-centered, and each individual's commitment to learning is critical. The present study also agrees with Teahen, who maintains that organizational learning is dependent on individual learning, but individual learning does not always contribute to collective learning. The present study also confirms the findings in a study by Wilson (1999): Faculty in a learning college are in a period of transition.

The present study also investigates the effect of working conditions on adjunct faculty motivation to improve teaching effectiveness and on their use of CATs. Grubb et al. (1999) argue that multiple commitments limit the time and energy adjunct instructors have for teaching and suggest that adjunct faculty working conditions may have an impact on teaching effectiveness or commitment to student learning. However, the literature supports the claim that adjunct faculty teach as well as full-time faculty (Johnson, 2000; Rose, 1992; Schwarze, 1996). Similarly, the present study also testifies to the strong commitment of part-time professors to student learning and student success and highlights the contribution of adjunct faculty at community colleges.

The present study continues to open the door to the value of part-time faculty in the teaching profession since previous research on adjunct faculty is scarce. Studies of how part-time faculty members go about the business of planning courses, teaching, engaging in classroom research, or using CATs hardly exist. Most research on community college teaching centers on full-time faculty; adjunct professors are addressed peripherally. In fact, the presence of a high percentage of adjunct faculty is often posed as a barrier to the goal of becoming a learning college. This study highlights the unique perspective of adjunct faculty as they learn about teaching through "on the job training." Interviews at all three sites showed the extent of adjunct faculty commitment to their students, openness to the learning paradigm, and willingness to use CATs to investigate student learning in the context of their classrooms. The study reveals, from an institutional perspective, the extent to which colleges that consider themselves learning-centered have worked to align adjunct faculty with institutional goals. It also extends the study of Gappa and Leslie (1993), who acknowledge that the purpose of their research is to shed light on the "invisible underclass" with the hope that they can learn about ways to improve adjunct faculty morale and commitment, and to move adjunct professors into the spotlight as valued faculty.

The present study shows that treating adjunct faculty as valuable contributors inspires valuable contribution. Adjunct faculty participants, particularly at Valencia Community College, responded to inclusion in their colleges by assuming active roles as researchers investigating teaching and learning. It may also contribute to adjunct faculty taking leadership roles in faculty development activities. Furthermore, integration of adjunct professors into an organization results in longer teaching histories and commitment to a particular institution.

Recommendations for Practice

Based on the data collected in the course of this study, there are nine recommendations for strengthening a learning college through community college adjunct faculty use of CATs.

Define and explain terms to community college adjunct faculty. Terms such as "learning college" and "scholarship of teaching" should be carefully defined and explained in literature distributed to adjunct faculty at community colleges. Language is not merely descriptive; it has the power to generate change. Language can be used to shape future goals and the methods used to reach those goals. The terms used should have a positive ring to them and not reflect a negative or judgmental tone. Therefore, attention should be drawn to key philosophical points and concrete applications. O'Banion's six principles can provide the general framework for discussion of an individual learning college's more detailed goals and decisions.

Introduce and reintroduce CATs. One of the barriers to using CATs was the sheer bulk of information in the 1993 Angelo and Cross handbook. This can be overcome with a template of "readymades" that are more easily accessed and used. This may also expand use of the rich variety of CATs in the handbook beyond the much relied upon One-Minute Paper and the Muddiest Point. Adjunct faculty should be informed of the three areas into which CATs are grouped, including knowledge and skills; attitudes, values and self-awareness; and reactions to instruction. They should match CATs to their teaching goals, which can be clearly targeted through use of the Teaching Goals Inventory. Also, adjunct faculty should be reminded of the "adapt, don't adopt" strategy and encouraged to create their own CATs. Reintroduction of CATs may provide the impetus for adjunct professors who feel they can "read student faces" to re-examine the value of CATs as a way to hear individual student concerns.

Reinforce the link between the learning paradigm and CATs. Learning-centered colleges are institutions that exist to produce learning, not just to provide instruction.

CATs not only monitor learning, they promote learning by providing useful information which professors can use to make decisions regarding their teaching practices. Underscoring the relationship of CATs to the learning paradigm leads to professor self-examination, reflection, and ongoing improvement.

Conduct workshops in designing CATs. Help reduce feelings of vulnerability that can be a barrier to using CATs by assisting adjunct professors to write CATs that will not be directed at them personally. Describe CATs as an important learning tool and acknowledge that a professor's comfort level with the experience of using CATs builds over time.

Include community college adjunct faculty in the planning of faculty development activities. Make the learning needs of adjunct faculty a critical part of the institution. In a learning-centered college, everyone is a learner. Therefore, faculty development of adjunct professors must be an integral part of college planning, and adjunct faculty input into that planning will make it more effective. Although a mix of required and self-selected activities can be offered, an assessment and evaluation component needs to be established as well, so that a college can determine whether a given activity reaches its own stated goal. For example, if adjunct faculty members comment repeatedly that orientation is not a learning experience, then this time-honored tradition needs reexamination. Also, there may not be one model program that will meet the needs of all community colleges; programs should be tailored to the varying needs of the adjunct faculty pool at an individual institution.

Provide a learning environment in which adjunct faculty are prepared and challenged to actively research teaching and learning in actual classroom settings

and assume a leadership role in the restructuring of teaching and learning. Resistance to changed practices among adjunct faculty is often a reaction to the feeling that an idea or activity is being imposed upon them. An institution that is receptive to new ideas that begin at the "grassroots" has opened the door to new possibilities in teaching practices. The institution can then follow up by exploring the effect of these practices on student learning. A college environment that supports individual inquiry into teaching and learning demonstrates the respect it has for its adjunct faculty and builds loyalty among that population. Rather than informing adjunct professors on how to teach, a learning environment gains insight from their experiences and seeks ways to extend collective learning.

Make channels available for the sharing of CATs for those adjunct professors who choose to share. Although use of CATs emerged as a private enterprise in this study, it cannot be concluded that sharing CATs does not have value. While adjunct faculty may closely "guard" the actual CATs used in their classrooms, general conversations may lead the way to greater disclosure in the future. A long history of the privacy of classroom settings may require time and many intermediate steps before they open up and sharing begins.

Create an environment in which adjunct faculty contribute to a learning-centered college. Comments by participants in the study suggest that thinking of adjunct faculty as a barrier to a college's becoming learning-centered can become a self-fulfilling prophecy. A learning college searches for ways to put all of its resources to work. Adjunct professors bring a wealth of life experiences to the classroom setting; their desire to teach effectively and share their area of expertise with their students provide opportunities to better understand the complex relationship between knowledge of a subject and passing that knowledge along to students. Adjunct faculty engaging in contextual research can be a valuable asset to a learning college.

Build institutional structures and generate plans that show respect for adjunct faculty contribution. While many of the adjunct faculty participants were critical of low pay and lack of benefits in their present part-time positions, there was a much more unfavorable, at time hostile, attitude toward lack of recognition by college administration. Adjunct professors expressed the need for feeling valued. Positive steps in this direction include the presence of top administrators at adjunct faculty events, consistent treatment both during and after SACs accreditation visits, inclusion of adjunct faculty in planning activities, and the presence of an adjunct faculty facilitator who can orchestrate activities for professors who spend limited time on campus and need a single source of information. Revision of course scheduling and planning also has the potential to improve the relationship between adjunct faculty and administrators. Course cancellation or teacher reassignment, often when the semester is already underway, means that adjunct professors are sometimes stripped of classes after they have drawn up a syllabus and planned ahead for several months of teaching. Revisiting that flawed process stabilizes adjunct faculty schedules and shows respect. In addition, hiring practices for full-time faculty should reflect the value-added of adjunct professors who have participated in faculty development activities, classroom research, and individual projects related to teaching and learning. Failure to recognize participation in activities that support the learning college concept during hiring conveys to adjunct faculty that the administration itself does not take notice of who partakes in opportunities tc learn. Adjunct professors find out very quickly what "doesn't make a difference."

Recommendations for Further Study

1. There is a need for research on effective ways to introduce and reintroduce CATs. A study can compare on-line versus on-ground activities, disciplinary versus interdisciplinary approaches, or intracollegiate versus intercollegiate methods of launching presentations on formative assessment and CATs.

2. One of the strongest finding in this study was the reluctance of adjunct faculty to share results of specific CATs. They remained private documents. Classroom research projects that were mentioned during the interviews, however, seemed more suitable for public dialogue and exposure. A study of the types of classroom research projects generated at one college and the effect of those studies on other professors, a department, or the institution itself, would be of value. It would be interesting to know how individual classroom research projects generate learning.

3. The literature looks at the scholarship of teaching as disciplinary and/or interdisciplinary. Some writers suggest that an understanding of teaching and learning must be built around subject matter; others find that there are teaching practices that are common to all of the disciplines. These common areas are referred to as "trading zones" (Huber & Morreale, 2002). It would be valuable to investigate the ability of CATs to build "trading zones" among disciplines.

4. The inclusion of adjunct faculty in the culture of a community college is another timely topic. Strategies to include adjunct professors should be explored for their

effectiveness. One such strategy is changing the name "adjunct" to one that suggests something more than an "add on," or one that indicates the number of years of college teaching. It may also be valuable to investigate the effect of various reward structures. Hiring processes that recognize adjunct faculty participation in contextual classroom research or faculty development activities may yield interesting results.

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Appendix A
Approval Letters

Florida Atlantic University Institutional Review Board Approval Memorandum
Valencia Community College Office of Institutional Research
Broward Community College Office of Research and Planning
Palm Beach Community College Office of Institutional Effectiveness

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INSTITUTIONAL REVIEW BOARD
Human Subjects Review Committee

MEMORANDUM

DATE: August 6, 2002

TO: Michele Acker-Hocevar,
Heidi Tuby,
Educational Leadership

FROM: Susan Love Brown, Chair Susan Love Brown

RE: H02-120 "Community College Adjunct Faculty: The Use of Classroom Assessment Techniques and The Learning College"

The Institutional Review Board (IRB) has reviewed the above protocol. Under the provisions for expedited review, the proposed research has been found acceptable as meeting the applicable ethical and legal standards for the protection of the rights and welfare of the human subjects involved.

This approval is valid for **one year from the above memo date**. This research must be approved on an annual basis. It is now your responsibility to renew your approval annually and to keep the IRB informed of any substantive change in your procedures or of any problems of a human subjects' nature.

Please do not hesitate to contact either myself (7-2325) or Elisa Gaucher (7-2318) with any questions.

SLB:ceg

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VALENCIA
Community College

August 5, 2002

Ms. Heidi Tuby
2021 Northwest 25th Street
Boca Raton, FL 33431

Dear Ms. Tuby:

The purpose of this letter is to grant you permission to interview a selected number of adjunct faculty at Valencia Community College. It is my understanding that the interviews will be used as source data for your dissertation entitled "Community College Adjunct Faculty: The Use of Classroom Assessment Techniques and the Learning College" to complete your doctoral studies at Florida Atlantic University.

Like most other community colleges, Valencia relies heavily on our excellent adjunct cadre to deliver quality instruction, so we are very interested in the findings from your study. Your contact at Valencia will be Mr. Patrick Nellis, with whom you have already had some initial conversations. If I may be of further assistance to you, please let me know. Good luck on your project.

Sincerely,

Ronald B Nelson

Ronald B. Nelson
Director, Office of Institutional Research

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letter from Dr. Ted Wright

Subj:Re: hi from Heidi
Date:7/29/2002 1:03:07 PM Eastern Standard Time
From:twright@broward.edu
To:HeidiTuby@aol.com
Sent from the Internet

Hello Heidi,

I discussed your research plan with Dr. McFarlane, and we have no concerns about your desire to interview/survey adjunct faculty here at Broward Community College. I would anticipate that Trish Joyce will be very supportive, and we wish you great success with your dissertation study. As always, we would appreciate receiving a copy of your results insofar as they may be most helpful to us in our efforts to provide faculty development opportunities for our adjuncts. Please don't hesitate to contact me if I can be of assistance to you during the implementation phase. Again, best of luck with this important study.

Dr. Ted Wright
Director, Research and Planning
Broward Community College

pbcc
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July 2, 2002

Heidi Tuby
2021 Northwest 25th Street
Boca Raton, Florida 33431

Dear Ms. Tuby,

This letter serves as official notice that you have been granted approval to conduct your research, as partial fulfillment for the Doctor of Education degree at Florida Atlantic University. The topic "The Use of Classroom Assessment Techniques and The learning College, and approach should prove beneficial to Palm Beach Community College and education.

We, at the College, look forward to the successful completion of your dissertation. The results should have particular relationships to teaching, learning, supervision and faculty training.

Please keep me informed during the process. This approval is contingent upon the approval of the Provost, D. Celeste Beck. Ginger Pedersen, Associate Dean for Academic Services, will serve as your administrative contact. Please do not hesitate to call me if I can be of further assistance.

Sincerely,

Seymour Samuels, Ed.D.
Director, Institutional Effectiveness

Appendix B
Consent Forms

CONSENT FORM

1) **Title of Research Study:** Community College Adjunct Faculty: The Use of Classroom Assessment Techniques and The Learning College

2) **Investigators:** Dr. Michele Acker-Hocevar, Principal Investigator
Heidi S. Tuby, Investigator

3) **Purpose:** The purpose of this study is to describe community college adjunct faculty responses to the use of Classroom Assessment Techniques (CATs) and to explore the extent to which CATs generate an interest in public dialogue on teaching and learning. This study is significant because an understanding of the use of CATs and insights into adjunct teaching experiences may be effective steps toward building stronger learning-centered community colleges.

4-A) **Procedures:**
Participation in this study will require one interview of faculty development administrators and two interviews of adjuncts; the interviews will be conducted at the community colleges where the participants work and teach. All of the interviews will be audio taped. The investigator will complete transcription of the tapes. Field notes will be written after every interview. The interview of the faculty development administrator will take about two hours to complete. Although an interview guide will be used, the questioning will be conversational and semi-structured, allowing for spontaneous questions and answers. Each adjunct interview will take about one hour; there will be a two-week interval between the two interviews. Although interview guides will be used at each session, the questioning will also be flexible. At the second interview, adjuncts will have the opportunity to share actual CATs with the investigator. The investigator will ask to keep actual CATs for further document analysis. After their interviews are completed, all participants will be given a demographic profile sheet, which asks for basic information about the participant's education, degrees, and background; it also asks the participant for further reflections. The demographic profile sheet is to be returned to the investigator in a stamped, addressed envelope.

5) **Risks:**
The risks involved with participation in this study are no more than one would experience in regular daily activities.

6) **Benefits:**
Potential benefits that participants may attain from participation in this research study include the following: a greater awareness of CATs and the opportunities they provide, an interest in increasing use of CATs in community college classrooms, recognition of the need for faculty development activities to foster that interest, and increased involvement in the development of a learning college.

Initials of Participant __________

7) **Data Collection & Storage:**
All of the audio tapes, transcriptions, demographic profile sheets, CATs, and field notes will be kept confidential and secure; only the investigator will see the data, unless required by law. The results will not be released in any way that might allow the identification of the participants without the participants' agreement, unless required by law. The audio tapes, transcriptions, demographic profile sheets, CATs, and field notes will be stored in a locked filing cabinet in the investigator's home; the audio tapes, transcriptions, demographic profile sheets, and field notes will be destroyed one year after the conclusion of the study. CATs will be returned by mail to the adjuncts who shared them.

8) **Contact Information:**
For related problems or questions regarding your rights as a participant, the Office of Sponsored Research of Florida Atlantic University can be contacted at (561) 297-2310. For all other questions about the study, you should call Dr. Michele Acker-Hocevar at (561) 297-3555 or Heidi Tuby at (561) 997-6226.

9) **Consent Statement:**
I have read or had read to me the preceding information describing this study. All my questions have been answered to my satisfaction. I am 18 years of age or older and freely consent to participate. I understand that I am free to withdraw from the study at any time. I have received a copy of this consent form.

Signature of Participant: ______________________________ Date: ____________
Signature of Investigator: ______________________________ Date: ____________

IRB
Approval Date: 8/6/02
Initials: ________

PBCC Personnel

Palm Beach Community College

Consent Form Research/Study Project

This research/study project is being conducted by Palm Beach Community College adjunct instructor, Heidi S. Tuby, a graduate student at Florida Atlantic University in the College of Education, Department of Educational Leadership. She is conducting this research/study as partial fulfillment towards the Doctor of Education degree.

The purpose of the research/study is to describe community college adjunct faculty responses to the use of Classroom Assessment Techniques (CATs) and to explore the extent to which CATs generate an interest in public dialogue on teaching and learning.

The results of this research/study will be used to gain insight into the adjunct teaching experience, explore new possibilities for faculty development activities, and strengthen community colleges as learning-centered institutions.

I _______________ have been informed of the purpose of, use of results in, and my participation in this study. I agree to participate in this study. I realize what is required of me and that the person conducting the study will be the only person seeing my results, and at no time will my identity be revealed to anyone without my expressed consent. This consent form will be the property of Palm Beach Community College and maintained in the Office of Institutional Effectiveness. This consent form is kept only to document my consent as a participant in the study.

I realize that I may withdraw from the study at any point in time.

Signed: ____________________

Dated: ____________________

Appendix C
Interview Guide—The Instrument—Faculty Development Administrator Participant

Interview Guide—The Instrument—Faculty Development Administrator Participant

BACKGROUND

What are your responsibilities as a faculty development administrator?

Why do you work at a community college?

Why at this particular college?

What is it like to work in faculty development at this institution? How does it compare to other institutions you have worked at?

How knowledgeable are you about teaching/pedagogy by your own estimation?

How have you learned about teaching? (graduate program, building upon your own experiences, mentoring, etc.)

Based on your own experiences and observations, does the faculty development program treat adjunct faculty differently than full-time faculty? In what ways?

Do adjunct professors reach out to you when they have a problem? Give an example.

What other types of resources on good teaching practices are available at this college?

INTRODUCTION TO CLASSROOM ASSESSMENT TECHNIQUES

When and where were you first introduced to CATs?

What was your reaction to that introduction?

Did you ask other administrators/faculty members about their experiences with CATs? Explain your response.

Have you ever tried using CATs in your own classroom? Why or why not?

Did you use them willingly or reluctantly at first?

What did you learn from your experiences using them?

What other formative assessment techniques have you tried?

To what extent is personal motivation important for using CATs?

What would make CATs a more useful tool for professors?

How do you think working as an adjunct professor impacts on the use of CATs?

FACULTY DEVELOPMENT PROGRAM

Describe in detail the way that CATs are introduced to faculty. Is the approach any different with adjunct faculty?

Are CATs equally valuable to full-time and part-time faculty? Explain your response.

To what extent does the faculty development program follow up on what they have exposed their professors to?

In your judgment, to what extent is institutional support important for using CATs?

Do you feel that CATs should be referred to and promoted more often? Why or why not?

What changes would you recommend for your faculty development program and CATs?

PUBLIC DIALOGUE ON CLASSROOM ASSESSMENT TECHNIQUES

Do professors talk about CATs informally at the faculty development center (teaching and learning center)? Describe an impromptu conversation in which CATs were a topic.

Are CATs ever discussed formally—i.e. at a "roundtable" during orientation, in a special session on faculty development day, at a department meeting? Describe a discussion.

Is there a time when adjunct faculty specifically get together to discuss CATs? Describe the setting.

Would you like more opportunities to share informally or formally what has been learned by using CATs? Explain your response.

In what ways are teaching and learning deeply valued at this institution?

Is the promotion of CATs by your faculty development program at this college a manifestation of a deep concern for student learning? Explain your response.

How would you describe a learning college? Is this a learning college?
Are CATs an asset to a learning college? To what extent?

In what ways can CATs contribute to the scholarship of teaching or a general body of knowledge on teaching and learning?

PROJECTING AHEAD

Should CATs be mandatory? Explain.

Do you feel that CATs are a fad? Why or why not?

How can this community college raise awareness of the benefits of CATs for adjunct faculty?

Appendix D
Interview Guide—The Instrument—Adjunct Faculty Participant

Interview Guide—The Instrument—Adjunct Faculty Participant

FIRST INTERVIEW

BACKGROUND

Is teaching a career path for you—or do you teach as an adjunct professor "on the side"?

Why do you teach at a community college?

Why at this particular college?

What is it like to work as an adjunct professor at this institution? Describe your working conditions.

Do you work at other colleges at the same time? How do they compare?
Describe your lifestyle as a result of this arrangement.

How knowledgeable are you in your field/discipline by your own estimation?

How knowledgeable are you about teaching/pedagogy by your own estimation?

How have you learned how to teach? (graduate program, building upon your own experiences, mentoring, etc.)

Explain the similarities or differences in the way you teach from the types of experiences you had as a student.

INTRODUCTION TO CLASSROOM ASSESSMENT TECHNIQUES

When and where were you first introduced to CATs?

What was your reaction to that introduction?

Describe your first experience using CATs in your classroom? Did you use them willingly or reluctantly at first?

What did you learn during your first semester using them?

After this first attempt, how did you plan to use CATs the following semester?

To what extent has personal motivation influenced your use of CATs?

How does your position or working conditions as an adjunct professor influence the decisions you make in your teaching practices and your use of CATs.

FACULTY DEVELOPMENT OPPORTUNITIES

Describe your contact with the faculty development program (this includes both activities organized by the program and access to the faculty development center/teaching and learning center) at this college?

Based on your own experiences and observations, does the faculty development program treat adjunct faculty differently than full-time faculty? In what ways?

To what extent does the program reach out to you?

To what extent do you reach out for help?

How important is institutional support for you to use CATs?

How often are CATs mentioned as part of the faculty development program at this college? Are they merely alluded to or are they discussed in depth?

To what extent should your faculty development program explain and promote the use of CATs more?

What changes would you recommend for the faculty development program and CATs?

SECOND INTERVIEW

EXPERIENCES USING CLASSROOM ASSESSMENT TECHNIQUES

How do you decide which CATs to use? What is your "formula" for using CATs? Or, do you tailor your use of them to every class or situation?

Describe a classroom situation in which you decided you wanted to use CATs. What prompted you to use them? What might have stopped you from using them?

What did you learn from using CATs in these particular situations? (If the participant brings actual CATs to the interview, review them together).

When, if ever, are CATs disappointing to you?

When, if ever, do CATs go beyond your expectations?

In general, how have CATs helped you to understand your students and what they have learned?

PUBLIC DIALOGUE ON CLASSROOM ASSESSMENT TECHNIQUES

Do you usually keep the results of your CATs to yourself? Why?

Do you share what you learn from using CATs with your students? Describe this experience.

Do you share what you learn from using CATs with colleagues? Describe this experience.

Do you share what you learn from using CATs with anyone else? Describe this experience.

Do you feel you can turn to the faculty development program with concerns you have as a result of using CATs?

Do instructors talk about CATs informally? Recall a conversation you had about CATs.

Are CATs ever discussed formally—i.e. at a "roundtable" during orientation, in a special session on faculty development day, at a department meeting? Describe the discussion.

Describe the types of opportunities to share informally or formally that you would like to have at your college.

Would it be more valuable to you to publicly share information on CATs within your discipline or department? Or, is it just as valuable to discuss them as a topic that is interdisciplinary?

What do you think could be learned from the shared experience?

Describe an event when CATs were specifically addressed by adjunct faculty.

Are you as comfortable sharing negative feedback in comparison with positive feedback? Describe each type of situation.

Would you like more opportunities to share informally or formally? Explain your response.

In what ways are teaching and learning deeply valued at this institution?

How would you describe a learning college? Is this a learning college? How are you involved in the learning college? Are CATs an asset to a learning college? To what extent?

In what ways can CATs contribute to the scholarship of teaching or a general body of knowledge about teaching and learning?

PROJECTING AHEAD

If you start to work at another institution where CATs are not promoted, would you continue to use them? Explain your response.

At what point might you stop using CATs?

Should CATs be mandatory? Explain.

Do you think that CATs are a fad? Why or why not?

How can this community college raise awareness of the benefits of CATs for adjunct faculty?

Appendix E
Getting To Know You—Faculty Development Administrator Participant

Getting To Know You!—Faculty Development Administrator Participant

Your racial/ethnic background

Your title at the college

Degrees earned

Describe the basic chronology of your education and previous work experiences

Your present responsibilities

Courses you have taught or are now teaching

Reflections on community colleges in general

Reflections on this community college

Reflections on the ability to "reach" students through Classroom Assessment Techniques

Further reflections after the interview

Is there anything else you would like me to know?

Appendix F
Getting To Know You—Adjunct Faculty Participant

Getting To Know You!—Adjunct Faculty Participant

Your racial/ethnic background

Your title at the college

Department

How long have you been teaching?

How long have you been teaching at this institution?

Courses you have taught

Courses you are teaching now

Degrees earned

Describe the basic chronology of your education and previous work experiences

Reflections on teaching at this community college

Reflections on your ability to "reach" your students through
Classroom Assessment Techniques

Further reflections after the interview

Is there anything else you would like me to know?

Appendix G
Responses to the Study

Subj: **Re: Recommendations based on dissertation research**
Date: 3/19/2003 9:21:51 AM Eastern Standard Time

Heidi,

Thank you for sharing your work with me and good luck on your defense. I think that the issue of adjunct faculty development is critical as our colleges are asked to grow to serve the access needs evident in Florida. The funding for community colleges has not kept up with growth, thereby creating an increased use of adjuncts. This trend will continue and I predict that a majority of the instruction at our CCs will be done by adjuncts if the trend is not reversed in the next two years. The reality then is that we must do a better job of "professionalizing" this important part of our instructional work force. This involves other things, not just faculty development, but faculty development linked to a sound evaluation and retention program for adjuncts will be the key for our colleges and our students. Your work shows us that we have a long way to go before we can say that we have integrated adjuncts into a coherent program of staff development for these valuable teachers. Best wishes. WH

Willis Holcombe, President
Broward Community College
111 East Las Olas Boulevard
Fort Lauderdale, FL 33301

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Signature: Heidi S. Tuby	Printed Name/Position/Title: Heidi S. Tuby	
Organization/Address: Florida Atlantic University Boca Raton, FL	Telephone: 561-997-6226	FAX: 561-496-7163
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